

GenCore version 4.5
Copyright (c) 1993 - 2000 CompuGen Ltd.

OM protein - protein search, using sw model

Run on: August 12, 2002, 10:46:59 ; Search time 16.3 Seconds
(without alignments)
424.444 Million cell updates/sec

Title: US-09-537-859b-2_COPY_28_99
Perfect score: 386
Sequence: 1 VSIPITCCFNVINRKIPIDQR.....ERWVRDSMKHLDIFQNLKP 72

Scoring table: BLOSUM62
Gapop 10.0 , Gapext 0.5

Searched: 283138 seqs, 96089334 residues

Number of hits satisfying chosen parameters: 283138

Minimum DB seq length: 0
Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%
Maximum Match 100%
Listing first 45 summaries

Database: PIR.71.*
1: PIR1.*
2: PIR2.*
3: PIR3.*
4: PIR4.*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB	ID	Description
1	382	99.0	99	2	JC5295	monocyte chemotact
2	277	71.8	99	2	JC2417	monocyte chemotact
3	270	69.9	97	2	JC4912	eotaxin precursor
4	249	64.5	99	2	A60299	monocyte chemotact
5	239	61.9	99	2	JC2136	monocyte chemotact
6	234	60.6	109	2	A54678	monocyte chemotact
7	219	56.7	96	2	I48099	eotaxin precursor
8	212	54.9	72	2	A55984	monocyte chemotact
9	212	54.9	96	2	JC2478	eotaxin precursor
10	211	54.7	148	1	A30209	PDGF-inducible JE
11	209	54.1	99	1	A39296	monocyte chemotact
12	209	54.1	99	2	JC2336	monocyte chemotact
13	209	54.1	125	2	I46857	monocyte chemotact
14	200	51.8	148	1	S07723	immediate-early se
15	180	49.2	120	2	I48147	monocyte chemotact
16	172.5	44.7	97	2	A48093	monocytic cytokine
17	149.5	38.7	93	2	B35673	LD78-beta protein
18	142.5	36.9	92	2	A30574	macrophage inflamm
19	138.5	35.9	92	1	A31767	macrophage inflamm
20	136.5	35.4	92	2	I46730	macrophage inflamm
21	130.5	33.8	92	2	C30552	macrophage inflamm
22	128	33.4	92	2	I53322	macrophage inflamm
23	128	33.2	92	2	A33393	macrophage inflamm
24	127.5	33.0	114	1	ETHUL	lymphotactin precu
25	121.5	31.5	91	1	A28815	monocyte chemotact
26	120	31.1	120	2	JE0177	lymphocyte and mon
27	118.5	30.7	114	1	ETMSL	lymphotactin precu
28	116.5	30.2	91	1	A46539	monocyte chemotact
29	114	29.5	96	2	A37236	I-309 protein prec

30	111	28.8	92	2	S24236	TCA3 protein - mon
31	104	26.9	50	2	C60407	monocyte adherence
32	96	24.9	116	2	I49555	gene C10 protein -
33	85	22.0	101	2	S42496	interleukin-8 prec
34	85	22.0	103	2	A53096	interleukin-8 prec
35	79	20.5	95	2	UN0841	interleukin-8 - do
36	77	19.9	101	2	I46871	interleukin-8 - ra
37	75	19.4	99	2	A37034	interleukin-8 prec
38	72	18.7	101	2	I48148	Neutrophil attract
39	71.5	18.5	117	2	B44253	alveolar macrophag
40	71.5	18.5	459	2	T44201	hypothetical prote
41	71.5	18.5	459	2	T44014	segment pp65/72k,
42	66	17.1	114	2	A55010	neutrophil-activat
43	66	17.1	132	2	A57325	C-X-C chemokine li
44	65	16.8	75	2	A54188	granulocyte chemot
45	65	16.8	93	2	G01540	cytokine SDF-1-bet

ALIGNMENTS

RESULT 1
JC5295
monocyte chemotactic protein-2 precursor - human
C:Species: Homo sapiens (man)
C:Date: 02-May-1997 #sequence_revision 18-Jul-1997 #text_change 20-Jun-2000
C:Accession: JC5295
R:Van Collie, E.; Froyen, G.; Nomiya, H.; Miura, R.; Fiten, P.; Van Aelst, I.; Van Blochem, Biophys. Res. Commun. 231, 726-730, 1997
A:Title: Human monocyte chemotactic protein-2: cDNA cloning and regulated expression
A:Reference number: JC5295; MID:97224420
A:Accession: JC5295
A:Molecule type: mRNA
A:Residues: 1-99 <VAN>
A:Cross-references: GB:Y10802; NID:91924937; PID:CAA71760.1; PID:91924938
A:Experimental source: bone marrow
C:Comment: This protein belongs to the beta-chemokine family which is one of the major ligands and in tumor biology, and contribute to the trafficking and recruitment of the res
C:Genetics:
A:Gene: mcp-2
C:Superfamily: macrophage inflammatory protein
F:1-23/Domain: signal sequence #status predicted <Sig>
F:24-99/Product: monocyte chemotactic protein-2 #status predicted <Mat>

Query Match 99.0%; Score 382; DB 2; Length 99;
Best Local Similarity 98.6%; Pred. NO. 8.4e-37;
Matches 71; Conservative 1; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPIDQRLESTYRINICPKREAVIFKTKRGKVCADPKERWRDSM 60
DB 28 VSIPITCCFNVINRKIPIDQRLESTYRINICPKREAVIFKTKRGKVCADPKERWRDSM 87

OY 61 KHLDDIFQNLKP 72
DB 88 KHLDDIFQNLKP 99

RESULT 2
JC2417
monocyte chemotactant protein-2 precursor - pig
C:Species: Sus scrofa domestica (domestic pig)
C:Date: 24-Feb-1995 #sequence_revision 24-Feb-1995 #text_change 16-Jul-1999
C:Accession: JC2417
R:Hosang, K.; Kroke, I.; Klaudiny, J.; Wempe, F.; Wutke, W.; Scheit, K.H.
Biochem. Biophys. Res. Commun. 205, 148-153, 1994
A:Title: Porcine luteal cells express monocyte chemotactant protein-2 (MCP-2): Ana
A:Reference number: JC2417; MID:95091716
A:Accession: JC2417
A:Molecule type: mRNA
A:Residues: 1-99 <HOS>
A:Cross-references: GB:Z48480; NID:9683718; PID:CAA8371.1; PID:9683719
A:Experimental source: corpus luteum

C:Superfamily: macrophage inflammatory protein
 F:1-23/Domain: signal sequence #status predicted <SIG>
 F:24-99/Product: monocyte chemoattractant protein-2 #status predicted <MAT>

Query Match 71.8%; Score 277; DB 2; Length 99;
 Best Local Similarity 70.8%; Pred. No. 1e-24;

Matches 51; Conservative 10; Mismatches 11; Indels 0; Gaps 0;

1 VSIPICCFNVINRKIPRIORLESTYRTINIOCPKPAVIFKTKRGKVCADPKERWVDSM 60
 Db 28 VSIPICCFNVINRKIPRIORLESTYRTINIOCPKPAVIFKTKRGKVCADPKERWVDSM 87

61 KHLDOIFONLKP 72
 Db 88 KHLDOIFONLKP 99

RESULT 3

12
 C:kin precursor - human

C:Species: Homo sapiens (man)

C:Date: 01-Nov-1996 #sequence_revision 01-Nov-1996 #text_change 20-Jun-2000

C:Accession: J04912

R:Barlels, J.; Schluter, C.; Richter, E.; Noso, N.; Kulke, R.; Christophers, E.; Schroe
 Blochem. Biophys. Res. Commun. 225, 1045-1051, 1996

A:Title: Human dermal fibroblasts express eotaxin: Molecular cloning, mRNA expression, &
 A:Reference number: J04912; MUID:96374440

A:Accession: J04912

A:Status: preliminary

A:Molecule type: mRNA

A:Residues: 1-97 <BAR>

A:Cross-references: EMBL:Z75668; NID:91531982; PIDN:CAA99997.1; PID:91531983

A:Experimental source: dermal fibroblast

C:Comment: This protein has eosinophil specific chemotactic activity.

C:Superfamily: macrophage inflammatory protein

C:Keywords: fibroblast

F:1-18/Domain: signal sequence #status predicted <SIG>

F:19-97/Product: eotaxin #status predicted <MAT>

Query Match 69.9%; Score 270; DB 2; Length 97;
 Best Local Similarity 67.6%; Pred. No. 6.3e-24;
 Matches 48; Conservative 12; Mismatches 11; Indels 0; Gaps 0;

2 SIPTCCFNVINRKIPRIORLESTYRTINIOCPKPAVIFKTKRGKVCADPKERWVDSM 61
 Db 27 SVPTCCFNVINRKIPRIORLESTYRTINIOCPKPAVIFKTKRGKVCADPKERWVDSM 86

62 HLDQIFONLKP 72
 Db 87 YLDQKSPKPK 97

monocyte chemoattractant protein 1 precursor - human
 N:Alternate names: GDF-1; glioma-derived monocyte chemotactic factor 1; MCAF; MCP-1; mcf
 C:Species: Homo sapiens (man)
 C:Date: 20-Feb-1993 #sequence_revision 20-Feb-1993 #text_change 16-Jul-1999
 C:Accession: A35474; A35476; S03339; J1841; A60299; A32300; A32396; A4561; I57488; J01
 R:Shyy, Y.J.; Li, Y.S.; Kolattukudy, P.E.
 Blochem. Biophys. Res. Commun. 169, 346-351, 1990

A:Title: Structure of human monocyte chemotactic protein gene and its regulation by TPA.

A:Reference number: A35474; MUID:90290466

A:Accession: A35474

A:Molecule type: DNA

A:Residues: 1-99 <SHY>

A:Cross-references: GB:M37719; NID:9187447; PIDN:AAA18102.1; PID:9487124

A:Reference number: A33476; MUID:90097880

A:Accession: A33476

A:Molecule type: mRNA

A:Residues: 1-99 <ROD>

A:Cross-references: GB:M30816; GB:M31625; GB:M31626; NID:9188701; PIDN:AAA36330.1; PI
 R:Yoshimura, T.; Yuhki, N.; Moore, S.K.; Appella, E.; Lerman, M.I.; Leonard, E.J.
 FEBS Lett. 244, 487-493, 1989

A:Title: Human monocyte chemoattractant protein-1 (MCP-1). Full-length cDNA cloning,
 A:Reference number: S03339; MUID:89155605

A:Accession: S03339

A:Status: not compared with conceptual translation

A:Molecule type: mRNA

A:Residues: 1-99 <ROS>

A:Cross-references: GB:X14768; NID:934513; PIDN:CAA32876.1; PID:934514

A:Experimental source: glioma cell line U-105MG

R:Yoshimura, T.; Leonard, E.J.

Adv. Exp. Med. Biol. 305, 47-56, 1991

A:Title: Human monocyte chemoattractant protein-1 (MCP-1).
 A:Reference number: I51841; MUID:92095166

A:Accession: I51841

A:Status: preliminary; translated from GB/EMBL/DBJ

A:Molecule type: mRNA

A:Residues: 1-99 <YOZ>

A:Cross-references: GB:S71513; NID:9240867; PIDN:AA820651.1; PID:9240868

R:Botazzi, B.; Colotta, F.; Sica, A.; Nobili, N.; Mantovani, A.

Int. J. Cancer 45, 795-797, 1990

A:Title: A chemoattractant expressed in human sarcoma cells (tumor-derived chemotacti
 -1/MCAF).
 A:Reference number: A60299; MUID:90216082

A:Accession: A60299

A:Status: not compared with conceptual translation

A:Molecule type: mRNA

A:Residues: 1-99 <BOF>

R:Funatani, Y.; Nomura, H.; Notake, M.; Oyama, Y.; Fukui, T.; Yamada, M.; Larsen, C

Biochem. Biophys. Res. Commun. 159, 249-255, 1989

A:Title: Cloning and sequencing of the cDNA for human monocyte chemotactic and activa
 A:Reference number: A32300; MUID:89165862

A:Accession: A32300

A:Status: not compared with conceptual translation

A:Molecule type: mRNA

A:Residues: 1-99 <FUR>

A:Cross-references: GB:M24545; NID:9187434; PIDN:AAA18164.1; PID:9307163

R:Robinson, E.A.; Yoshimura, T.; Leonard, E.J.; Tanaka, S.; Griffin, P.R.; Shabanowitz
 Proc. Natl. Acad. Sci. U.S.A. 86, 1850-1854, 1989

A:Title: Complete amino acid sequence of a human monocyte chemoattractant, a putative
 A:Reference number: A32396; MUID:89184525

A:Accession: A32396

A:Molecule type: protein

A:Residues: X, 25-99 <ROB>

R:Decock, B.; Conings, R.; Lenaerts, J.P.; Billiau, A.; Van Damme, J.
 Blochem. Biophys. Res. Commun. 167, 904-909, 1990

A:Title: Identification of the monocyte chemotactic protein from human osteosarcoma c
 A:Reference number: A34561; MUID:90211336

A:Accession: A34561

A:Status: translated from GB/EMBL/DBJ

A:Molecule type: mRNA

A:Residues: 1-99 <LIV>

A:Cross-references: GB:S69738; NID:9545464; PIDN:AA829926.1; PID:9545465

R:Ye, Q.N.; Su, G.F.; Yuan, Y.; Huang, C.F.

Chinese J. Microbiol. Immunol. 14, 29-32, 1994

A:Title: The PCR, cloning and sequencing of human monocyte chemoattractant protein-1
 A:Reference number: J01096

A:Accession: J01096

A:Molecule type: mRNA

A:Residues: 24-28, 'Q', 30-99 <YEO>

GenCore version 4.5
Copyright (c) 1993 - 2000 Compugen Ltd.

OM protein - protein search, using sw model

Run on: August 12, 2002, 10:48:00 ; Search time 11.92 Seconds

(without alignments)
233.876 Million cell updates/sec

Title: US-09-537-859b-2_COPY_28_99

Perfect score: 386
Sequence: 1 VSIPITCCFVNNKIPICR.....ERWVDSMKHLDFONLKP 72

Scoring table: BIOSUM62
Gapop 10.0 , Gapext 0.5

Searched: 105224 seqs, 38719550 residues

Tc: number of hits satisfying chosen parameters: 105224

Minimum DB seq length: 0

Maximum DB seq length: 200000000

Post-processing: Minimum Match 0%

Maximum Match 100%

Listing first 45 summaries

Database : SwissProt_40:*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB ID	Description
1	386	100.0	99	1	SY08_HUMAN
2	277	71.8	99	1	SY08_PIG
3	267	69.2	97	1	E07A_HUMAN
4	259	67.1	99	1	SY08_BOVIN
5	258	66.8	99	1	SY02_MACFA
6	249	64.5	99	1	SY02_HUMAN
7	241	62.4	104	1	SY12_MOUSE
8	239	61.9	99	1	SY02_PIG
9	239	61.9	101	1	SY02_CANFA
10	235	60.9	97	1	E07A_RAT
11	235	60.6	99	1	SY07_HUMAN
12	232	60.1	74	1	MCPB_BOVIN
13	229	59.3	97	1	E07A_MOUSE
14	220	57.0	97	1	SY08_MOUSE
15	219	56.7	96	1	E07A_CAVPO
16	216.5	56.1	98	1	SY13_HUMAN
17	211	54.7	148	1	SY02_MOUSE
18	209	54.1	99	1	MCPA_BOVIN
19	209	54.1	125	1	SY02_RABIT
20	200	51.8	148	1	SY02_RAT
21	190	49.2	120	1	SY07_CAVPO
22	177.5	46.0	97	1	SY07_MOUSE
23	175.5	45.5	97	1	SY07_RAT
24	164.5	42.6	70	1	REGI_BOVIN
25	155.5	40.3	90	1	SY04_CHICK
26	153	40.2	119	1	SY24_MOUSE
27	153	39.6	119	1	SY24_HUMAN
28	149.5	38.7	93	1	SY14_HUMAN
29	149.5	38.7	93	1	SY13_HUMAN
30	142.5	36.9	92	1	SY03_HUMAN
31	138.5	35.9	92	1	SY04_HUMAN
32	136.5	35.4	92	1	SY04_RABIT
33	132.5	34.3	393	1	SYD1_RAT

34	131.5	34.1	92	1	SY04_RAT	P50230 rattus norv
35	131.5	34.1	397	1	SYD1_HUMAN	P78423 homo sapien
36	130.5	33.8	92	1	SY04_MOUSE	P14097 mus musculu
37	129	33.4	92	1	SY03_RAT	P50229 rattus norv
38	128	33.2	92	1	SY03_MOUSE	P10855 mus musculu
39	127.5	33.0	94	1	SY26_HUMAN	O9Y258 homo sapien
40	127.5	33.0	114	1	SYC1_HUMAN	P47992 homo sapien
41	127.5	33.0	114	1	SYC2_HUMAN	O9ubd3 homo sapien
42	125.5	32.5	395	1	SYD1_MOUSE	O35188 mus musculu
43	124.5	32.3	91	1	SY05_CAVPO	P97272 cavia porce
44	123.5	32.0	89	1	SY18_HUMAN	P55774 h small ind
45	123.5	32.0	113	1	SY15_HUMAN	O16663 homo sapien

ALIGNMENTS

RESULT 1

ID	SY08_HUMAN	STANDARD	PRT	99 AA.
AC	P80075; P78388;			
DT	01-DEC-1992 (Rel. 24, Created)			
DT	01-NOV-1997 (Rel. 35, Last sequence update)			
DT	16-OCT-2001 (Rel. 40, Last annotation update)			
DE	Small, inducible, cytokine A8 precursor (Monocyte chemoattractant protein 2) (HC14).			
DE	(MCP-2) (Monocyte chemoattractant protein 2) (HC14).			
GN	SCYA8 OR SCYA10 OR MCP2.			
OS	Homo sapiens (Human).			
OC	Eukaryota; Metazoa; Chordata; Vertebrata; Euteleostomi;			
OC	Mammalia; Eutheria; Primates; Catarrhini; Homiidae; Homo.			
OX	NCBI_TaxID=9606;			
RM	[1]			
RP	SEQUENCE FROM N.A., AND VARIANT GLN-69.			
RX	MEDLINE=97237052; PubMed=9119400.			
RA	van Damme J., Fiten P., Nomiyama H., Sakaki Y., Yoshie O.,			
RA	van Damme J., Opendakker G.;			
RT	"The human MCP-2 gene (SCYA8): cloning, sequence analysis, tissue			
RT	expression, and assignment to the CC chemokine gene contig on			
RT	chromosome 17q11.2.";			
RL	Genomics 40:323-331(1997).			
RM	[2]			
RP	SEQUENCE FROM N.A., AND VARIANT GLN-69.			
RC	TISSUE=bone marrow;			
RX	MEDLINE=97224420; PubMed=9070881;			
RA	van Collille E., Froyen F., Nomiyama H., Miura R., Fiten P.,			
RA	van Aelst I., van Damme J., Opendakker G.;			
RT	"Human monocyte chemoattractant protein-2: cDNA cloning and regulated			
RT	expression of mRNA in mesenchymal cells.";			
RT	Biochem. Biophys. Res. Commun. 231:726-730(1997).			
RM	[3]			
RP	SEQUENCE OF 23-99 FROM N.A.			
RX	MEDLINE=91207938; PubMed=2518726;			
RA	Chang H.C., Hsu F., Freeman G.J., Griffin J.D., Reinherz E.L.;			
RT	"Cloning and expression of a gamma-interferon-inducible gene in			
RT	monocytes: a new member of a cytokine gene family.";			
RT	Int. Immunol. 1:388-399(1989).			
RM	[4]			
RP	SEQUENCE OF 26-99.			
RC	TISSUE=Osteosarcoma;			
RX	MEDLINE=92308855; PubMed=1613466;			
RA	van Damme J., Proost P., Lenaerts J.-P., Opendakker G.;			
RT	"Structural and functional identification of two human, tumor-derived			
RT	monocyte chemoattractant proteins (MCP-2 and MCP-3) belonging to the			
RT	chemokine family.";			
RT	J. Exp. Med. 176:59-65(1992).			
RM	[5]			
RP	SUBUNIT.			
RX	MEDLINE=97053697; PubMed=8898111;			
RA	Kim K.-S., Rajarathnam K., Clark-Lewis I., Sykes B.D.;			
RT	"Structural characterization of a monomeric chemokine: monocyte			
RT	chemoattractant protein-3.";			
RT	FEBS Lett. 395:277-282(1996).			
CC	-!- FUNCTION: CHEMOTACTIC FACTOR THAT ATTRACTS MONOCYTES, LYMPHOCYTES,			

CC BASOPHILS AND EOSINOPHILS. MAY PLAY A ROLE IN NEOPLASIA AND
 CC INFLAMMATORY HOST RESPONSES. THIS PROTEIN CAN BIND HEPARIN.
 CC -1- SUBUNIT: MONOMER OR HOMODIMER; IN EQUILIBRIUM.
 CC -1- TISSUE SPECIFICITY: HIGHEST EXPRESSION FOUND IN THE SMALL
 CC INTESTINE AND PERIPHERAL BLOOD CELLS. INTERMEDIATE LEVELS SEEN IN
 CC THE HEART, PLACENTA, LUNG, SKELETAL MUSCLE, THYMUS, COLON, OVARY,
 CC SPINAL CORD AND PANCREAS. LOW LEVELS SEEN IN THE BRAIN, LIVER,
 CC SPLEEN AND PROSTATE.
 CC -1- INDUCTION: BY INTERFERON GAMMA, MITOGENS AND INTERLEUKIN-1.
 CC -1- SIMILARITY: BELONGS TO THE INTERCRINE BETA FAMILY (SMALL CYTOKINE
 CC C-C) (CHEMOKINE CC).
 CC -----
 CC This SWISS-PROT entry is copyright. It is produced through a collaboration
 CC between the Swiss Institute of Bioinformatics and the EMBL outstation -
 CC the European Bioinformatics Institute. There are no restrictions on its
 CC use by non-profit institutions as long as its content is in no way
 CC modified and this statement is not removed. Usage by and for commercial
 CC entities requires a license agreement (See <http://www.isb-sib.ch/announce/>
 CC or send an email to license@isb-sib.ch).
 CC -----
 DR EMBL: X99886; CAA68168.1; ALT_INIT.
 DR EMBL: Y10802; CAA71760.1; -
 DR EMBL: Y16645; CAA76341.1; -
 DR HSSP: P51671; LEOT.
 DR MIM: 602283; -
 DR InterPro: IPR001811; Chemokine_IL8.
 DR InterPro: IPR000827; Small_cytokine_CC.
 DR Pfam: PF00048; IL8; 1.
 DR SMART: SM00199; SCY; 1.
 DR PROSITE: PS00472; SMALL_CYTOKINES_CC; 1.
 DR Cytokine; Chemotaxis; Signal; Heparin-binding; Inflammatory response;
 KW Polymorphism.
 FT SIGNAL 1 23 PROBABLE.
 FT CHAIN 24 99 SMALL INDUCIBLE CYTOKINE A8.
 FT MOD_RES 24 24 PYRROLIDONE CARBOXYLIC ACID.
 FT DISULFID 34 59 BY SIMILARITY.
 FT DISULFID 35 75 BY SIMILARITY.
 FT VARIANT 69 69 K->Q.
 FT FTID=VAR_001633.
 SQ SEQUENCE 99 AA; 11246 MW; 9D67976BB9422P2A CRC64;
 Query Match 100.0%; Score 386; DB 1; Length 99;
 Best Local Similarity 100.0%; Pred. No. 1.2e-38;
 Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;
 QY 1 VSIPITCCFNVIKRIPIORLESYTRITNIQCPKEAVIFKTKRGKVCADPKERWVRDSM 60
 28 VSIPITCCFNVIKRIPIORLESYTRITNIQCPKEAVIFKTKRGKVCADPKERWVRDSM 87
 QY 61 KHLDOIFONLKP 72
 88 KHLDOIFONLKP 99
 DB 88 KHLDOIFONLKP 99
 RESULT 2
 SY08_PIG STANDARD; PRT; 99 AA.
 ID SY08_PIG
 AC P49873;
 DT 01-OCT-1996 (Rel. 34, Created)
 DT 01-OCT-1996 (Rel. 34, Last sequence update)
 DT 15-JUL-1999 (Rel. 38, Last annotation update)
 DE Small inducible cytokine A8 precursor (monocyte chemotactic protein 2)
 DE (MCP-2) (monocyte chemoattractant protein 2).
 GN SCY8 OR MCP2.
 OS Sus scrofa (Pig).
 OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
 OC Mammalia; Eutheria; Cetartiodactyla; Suina; Suidae; Sus.
 OC NCBI_TaxId=9823;
 RN [1]
 RP SEQUENCE FROM N.A.
 RX MEDLINE=95091716; PubMed=799015;
 RA Hosang K.K., Knoke I.I., Klaudiny J.J., Wempe F.F., Mutke W.W.,

RA Scheit K.K.;
 RT "Porcine luteal cells express monocyte chemoattractant protein-2
 RT (MCP-2): analysis by cDNA cloning and northern analysis.";
 RL Biochem. Biophys. Res. Commun. 205:148-153(1994).
 CC -1- FUNCTION: CHEMOTACTIC FACTOR THAT ATTRACTS MONOCYTES. THIS PROTEIN
 CC CAN BIND HEPARIN.
 CC -1- SUBUNIT: MONOMER OR HOMODIMER; IN EQUILIBRIUM (BY SIMILARITY).
 CC -1- SIMILARITY: BELONGS TO THE INTERCRINE BETA FAMILY (SMALL CYTOKINE
 CC C-C) (CHEMOKINE CC).
 CC -----
 CC This SWISS-PROT entry is copyright. It is produced through a collaboration
 CC between the Swiss Institute of Bioinformatics and the EMBL outstation -
 CC the European Bioinformatics Institute. There are no restrictions on its
 CC use by non-profit institutions as long as its content is in no way
 CC modified and this statement is not removed. Usage by and for commercial
 CC entities requires a license agreement (See <http://www.isb-sib.ch/announce/>
 CC or send an email to license@isb-sib.ch).
 CC -----
 DR EMBL: Z48480; CAA88371.1; -
 DR HSSP: P51671; LEOT.
 DR InterPro: IPR001811; Chemokine_IL8.
 DR InterPro: IPR000827; Small_cytokine_CC.
 DR Pfam: PF00048; IL8; 1.
 DR SMART: SM00199; SCY; 1.
 DR PROSITE: PS00472; SMALL_CYTOKINES_CC; 1.
 DR Cytokine; Chemotaxis; Signal; Heparin-binding; Inflammatory response;
 FT SIGNAL 1 23 BY SIMILARITY.
 FT CHAIN 24 99 PYRROLIDONE CARBOXYLIC ACID (BY
 FT MOD_RES 24 24 SIMILARITY).
 FT DISULFID 34 59 SMALL INDUCIBLE CYTOKINE A8.
 FT DISULFID 35 75 BY SIMILARITY.
 SQ SEQUENCE 99 AA; 10903 MW; D3DA0F7A964CDB1 CRC64;
 Query Match 71.8%; Score 277; DB 1; Length 99;
 Best Local Similarity 70.8%; Pred. No. 7.7e-26;
 Matches 51; Conservative 10; Mismatches 11; Indels 0; Gaps 0;
 QY 1 VSIPITCCFNVIKRIPIORLESYTRITNIQCPKEAVIFKTKRGKVCADPKERWVRDSM 60
 28 VSIPITCCFNVIKRIPIORLESYTRITNIQCPKEAVIFKTKRGKVCADPKERWVRDSM 87
 QY 61 KHLDOIFONLKP 72
 88 KHLDOIFONLKP 99
 DB 88 KHLDOIFONLKP 99
 RESULT 3
 EOTA_HUMAN STANDARD; PRT; 97 AA.
 ID EOTA_HUMAN
 AC P51671; P50877; Q92490; Q92491;
 DT 01-OCT-1996 (Rel. 34, Created)
 DT 01-OCT-1996 (Rel. 34, Last sequence update)
 DT 01-MAR-2002 (Rel. 41, Last annotation update)
 DE Eotaxin precursor (Eosinophil chemotactic protein).
 GN SCY11.
 OS Homo sapiens (Human).
 OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
 OC Mammalia; Eutheria; Primates; Catarrhini; Hominidae; Homo.
 OC NCBI_TaxId=9606;
 RN [1]
 RP SEQUENCE FROM N.A.
 RX MEDLINE=96181758; PubMed=8597956;
 RA Garcia-Zepeda E.A., Rothenberg M.E., Ownbey T.R., Leder P.,
 RA Luster A.D.;
 RT "Human eotaxin is a specific chemoattractant for eosinophil cells and
 RT provides a new mechanism to explain tissue eosinophilia.";
 RL Nat. Med. 2:449-456(1996).
 RN [2]
 RP SEQUENCE FROM N.A.
 RX MEDLINE=96189937; PubMed=8609214;
 RA Ponath P.D., Qin S., Ringler D.J., Clark-Lewis I., Wang J., Kassam N.,

GenCore version 4.5
Copyright (c) 1993 - 2000 Compugen Ltd.

OM protein - protein search, using sw model

Run on: August 12, 2002, 10:46:59 ; Search time 25.74 Seconds

(without alignments)
483,902 Million cell updates/sec

Title: US-09-537-859B-2_COPY_28_99
Perfect score: 386
Sequence: 1 VSTPTCCFNVINRKP...ERWVDSKHLDPQNLKP 72

Scoring table: BLOSUM62
Gapop 10.0 , Gapext 0.5

Searched: 562222 seqs, 172994929 residues

number of hits satisfying chosen parameters: 562222

Minimum DB seq length: 0
Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%
Maximum Match 100%
Listing first 45 summaries

Database : SPREMBL_19:*
1: sp.archaea:*
2: sp.bacteria:*
3: sp.fungi:*
4: sp.human:*
5: sp.invertebrate:*
6: sp.mammal:*
7: sp.mhc:*
8: sp.organelle:*
9: sp.phage:*
10: sp.plant:*
11: sp.potent:*
12: sp.virus:*
13: sp.vertebrate:*
14: sp.unclassified:*
15: sp.rviro:*
16: sp.bacteriophage:*
17: sp.archaea:*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB	ID	Description
1	259	67.1	100	6	095MD5	095md5 bos taurus
2	237	61.4	100	6	09TTQ4	09ttq4 equus caball
3	224	58.0	97	6	09TTQ6	09ttq6 bos taurus
4	222	57.3	81	6	09TTQ2	09ttq2 equus caball
5	221	57.3	99	6	09TTQ3	09ttq3 equus caball
6	212.5	55.1	79	4	095689	095689 mus musculus
7	211	54.7	148	11	090YD7	090yd7 mus musculus
8	206.5	53.5	97	11	092318	092318 capra hircus
9	173	44.8	62	4	095690	095690 homo sapiens
10	170	44.0	106	11	092292	092292 cricetus
11	164.5	42.6	75	6	09TTQ1	09ttq1 equus caball
12	153.5	39.8	90	13	09PMA6	09pma6 gallus galli
13	153.5	39.8	90	13	0910C9	0910c9 gallus galli
14	149.5	38.7	92	11	091210	091210 stigmodon hi
15	149.5	38.7	93	4	096168	096168 homo sapiens
16	146.5	38.0	80	4	014745	014745 homo sapiens

17	143.5	37.2	93	11	09ERD0	09erd0 rattus norv
18	135.5	35.1	95	12	098158	098158 kaposi's sa
19	132.5	34.3	99	6	095M01	095m01 canis famli
20	126.5	32.8	93	11	09WU26	09wu26 mus musculu
21	126.5	32.8	131	11	09R043	09r043 mus musculu
22	125.5	32.5	395	11	091V44	091v44 mus musculu
23	125	32.4	92	11	091265	091265 stigmodon hi
24	123.5	32.0	91	11	0912L1	0912l1 stigmodon hi
25	119	30.8	89	13	0918E0	0918e0 gallus galli
26	109.5	28.4	97	6	09BDJ2	09bdj2 bos taurus
27	107.5	27.8	97	13	057411	057411 gallus galli
28	107.5	27.8	133	11	091V84	091v84 mus musculu
29	104.5	27.1	101	13	093238	093238 cyprinus ca
30	101.5	26.3	100	13	09PT05	09pt05 oncorhynch
31	100.5	26.0	115	12	09WR77	09wr77 macaca mula
32	100.5	26.0	118	12	09J2M1	09j2m1 macaca mula
33	99.5	25.8	100	13	09PT03	09pt03 oncorhynch
34	98	25.4	116	11	09D830	09d830 mus musculu
35	97.5	25.3	100	13	09W691	09w691 oncorhynch
36	97.5	25.3	100	13	09PT07	09pt07 oncorhynch
37	97.5	25.3	100	13	09PT06	09pt06 oncorhynch
38	96.5	25.0	100	13	09PT54	09pt54 oncorhynch
39	96	24.9	116	11	099M24	099m24 mus musculu
40	91.5	23.7	100	13	09PT04	09pt04 oncorhynch
41	91.5	23.7	100	13	09PT53	09pt53 salmo trutt
42	89	23.1	44	6	09BG83	09bg83 pongo pygma
43	88.5	22.9	92	11	09Q2U2	09q2u2 mus musculu
44	88	22.8	76	11	09QUR9	09qur9 mus musculu
45	88	22.8	93	13	09PTR8	09ptr8 brachydanio

ALIGNMENTS

RESULT 1	PRELIMINARY:	PRT:	100 AA.
095MD5			
AC	01-DEC-2001 (TREMBLrel. 19, Created)		
DT	01-DEC-2001 (TREMBLrel. 19, last sequence update)		
DR	01-DEC-2001 (TREMBLrel. 19, last annotation update)		
DE	CHEMOTACTANT PROTEIN 2 (FRAGMENT).		
OS	Bos taurus (Bovine).		
OC	Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;		
CC	Mammalia; Eutheria; Cetartiodactyla; Ruminantia; Pecora; Bovidae;		
OX	Bovidae; Bovinae; Bos.		
RN	NCBI_TaxID=9913;		
RP	SEQUENCE FROM N.A.		
RA	Wellington D.		
RT	"Role of chemokines in respiratory syncytial virus infection."		
RL	Submitted (JUL-2001) to the EMBL/Genbank/DBJ databases.		
DR	EMBL; AF399641; AAK94451.1; -		
FT	NON_TER		
FT	1		
SEQUENCE	100 AA; 11001 MW; FLD308AD924FCAP6 CMC64;		

Query Match	67.1%;	Score 259;	DB 6;	Length 100;
Best Local Similarity	65.3%;	Pred. No. 9.4e-24;		
Matches	47;	Conservative 13;	Mismatches 12;	Indels 0;
			Gaps 0;	
QY	1	VSTPTCCFNVINRKP...ERWVDSKHLDPQNLKP 72		
DB	29	VSTPTCCFNVINRKP...ERWVDSKHLDPQNLKP 72		
QY	61	KHLDPQNLKP 72		
DB	89	RLLDCKSRTPKP 100		
RESULT 2				
QY	2	PRELIMINARY:	PRT:	100 AA.
QY	2	PRELIMINARY:	PRT:	100 AA.

AC 09T04;
 DT 01-MAY-2000 (TReMBLrel. 13, Created)
 DT 01-MAY-2000 (TReMBLrel. 13, Last sequence update)
 DT 01-DEC-2001 (TReMBLrel. 19, Last annotation update)
 DE EOTAXIN PRECURSOR.
 OS Equus caballus (Horse).
 OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
 OC Mammalia; Eutheria; Perissodactyla; Equidae; Equus.
 OC NCBI_TaxID=9796;
 RN [1]
 RP SEQUENCE FROM N.A.
 RX MEDLINE=21061912; PubMed=11044560;
 RA Benarafa C., Cunningham F.M., Hamblin A.S., Horohov D.W.,
 RA Collins M.E.;
 RT "Cloning of equine chemokines eotaxin, monocyte chemoattractant
 protein (MCP)-1, MCP-2 and MCP-4, mRNA expression in tissues and
 induction by IL-4 in dermal fibroblasts."
 RL Vet. Immunol. Immunopathol. 76:283-298(2000).
 DR EMBL; AJ251188; CAB61624.1; -.
 DR HSSP; P51671; 1EOT.
 DR InterPro; IPR001811; Chemokine_IL8.
 DR Pfam; PF00048; IL8; 1.
 DR SMART; SM00199; SCY; 1.
 DR PROSITE; PS00472; SMALL_CYTOKINES_CC; 1.
 DR SIGNAL.
 KW SIGNAL.
 FT CHAIN 1 23 POTENTIAL.
 FT CHAIN 24 100 EOTAXIN.
 SQ SEQUENCE 100 AA; 11247 MW; 11F08EC00E75D50B CRC64;

Query Match 61.4%; Score 237; DB 6; Length 100;
 Best Local Similarity 61.5%; Pred. No. 4.2e-21;
 Matches 40; Conservative 16; Mismatches 9; Indels 0; Gaps 0;

QY 1 VSIPITCCFNVINRKIPQRLSEYTRITNIOCPKEAVIFKTRKGEVCADPKERNVRSQM 60
 DB 26 VSISTVCCFNVASRKISFQRLQSYRKITSKCPQKAVIFKTRQAKRICADPKQKVVQDAM 85
 QY 61 KHLDDQ 65
 DB 86 KYLDE 90

RESULT 3
 Q9TTS6 PRELIMINARY; PRT; 97 AA.
 Q9TTS6;
 DT 01-MAY-2000 (TReMBLrel. 13, Created)
 DT 01-MAY-2000 (TReMBLrel. 13, Last sequence update)
 DT 01-JUN-2001 (TReMBLrel. 17, Last annotation update)
 DE EOTAXIN.
 OS Bos taurus (Bovine).
 OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
 OC Mammalia; Eutheria; Cetartiodactyla; Ruminantia; Pecora; Bovidae;
 OC Bovidae; Bovine; Bos.
 OC NCBI_TaxID=9913;
 RN [1]
 RP SEQUENCE FROM N.A.
 RA Vogel B., Klinder A., Aust G.;
 RT "Molecular cloning of bovine eotaxin mRNA."
 RL Submitted (FE8-1999) to the EMBL/GenBank/DBJ databases.
 DR EMBL; AJ132003; CAB61617.1; -.
 DR HSSP; P51671; 1EOT.
 DR InterPro; IPR001811; Chemokine_IL8.
 DR Pfam; PF00048; IL8; 1.
 DR SMART; SM00199; SCY; 1.
 SQ SEQUENCE 97 AA; 10965 MW; 9E65F23E1DDEB743 CRC64;

Query Match 58.0%; Score 224; DB 6; Length 97;
 Best Local Similarity 54.3%; Pred. No. 1.5e-19;
 Matches 38; Conservative 19; Mismatches 13; Indels 0; Gaps 0;

QY 2 SIPTCCFNVINRKIPQRLSEYTRITNIOCPKEAVIFKTRKGEVCADPKERNVRSQM 61
 DB 27 SIPTCCFNNSKRKISFQRLQSYRKITSKCPQKAVIFKTRQAKRICADPKQKVVQDAM 86
 QY 62 HLDQIFQNLK 71
 DB 87 YLNDKSGTLK 96

RESULT 4
 Q9TQ2 PRELIMINARY; PRT; 81 AA.
 Q9TQ2;
 DT 01-MAY-2000 (TReMBLrel. 13, Created)
 DT 01-MAY-2000 (TReMBLrel. 13, Last sequence update)
 DT 01-DEC-2001 (TReMBLrel. 19, Last annotation update)
 DE MONOCYTE CHEMOATTRACTANT PROTEIN-2 PRECURSOR (FRAGMENT).
 GN MCP-2.
 OS Equus caballus (Horse).
 OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
 OC Mammalia; Eutheria; Perissodactyla; Equidae; Equus.
 OC NCBI_TaxID=9796;
 RN [1]
 RP SEQUENCE FROM N.A.
 RX MEDLINE=21061912; PubMed=11044560;
 RA Benarafa C., Cunningham F.M., Hamblin A.S., Horohov D.W.,
 RA Collins M.E.;
 RT "Cloning of equine chemokines eotaxin, monocyte chemoattractant
 protein (MCP)-1, MCP-2 and MCP-4, mRNA expression in tissues and
 induction by IL-4 in dermal fibroblasts."
 RL Vet. Immunol. Immunopathol. 76:283-298(2000).
 DR EMBL; AJ251190; CAB61626.1; -.
 DR HSSP; P13500; 1DOK.
 DR InterPro; IPR001811; Chemokine_IL8.
 DR Pfam; PF00048; IL8; 1.
 DR SMART; SM00199; SCY; 1.
 KW SIGNAL.
 FT SIGNAL 1 23 POTENTIAL.
 FT CHAIN 24 >81 BY SIMILARITY.
 FT NON_TER 81 81
 SQ SEQUENCE 81 AA; 8838 MW; A34ADE103C386B0F CRC64;

Query Match 57.5%; Score 222; DB 6; Length 81;
 Best Local Similarity 72.2%; Pred. No. 2.2e-19;
 Matches 39; Conservative 9; Mismatches 6; Indels 0; Gaps 0;

QY 1 VSIPITCCFNVINRKIPQRLSEYTRITNIOCPKEAVIFKTRKGEVCADPKERNVRSQM 54
 DB 28 VSIPVTCFVGWKKVPIQRLSEYTRITSOSQSEAVIFKTRKVDKICADPKKK 81
 RESULT 5
 Q9TQ3 PRELIMINARY; PRT; 99 AA.
 Q9TQ3;
 AC 09TQ3;
 DT 01-MAY-2000 (TReMBLrel. 13, Created)
 DT 01-MAY-2000 (TReMBLrel. 13, Last sequence update)
 DT 01-DEC-2001 (TReMBLrel. 19, Last annotation update)
 DE MONOCYTE CHEMOATTRACTANT PROTEIN-1 PRECURSOR.
 GN MCP-1.
 OS Equus caballus (Horse).
 OC Eukaryota; Metazoa; Chordata; Craniata; Vertebrata; Euteleostomi;
 OC Mammalia; Eutheria; Perissodactyla; Equidae; Equus.
 OC NCBI_TaxID=9796;
 RN [1]
 RP SEQUENCE FROM N.A.
 RC TISSUE=LUNG;
 RX MEDLINE=21061912; PubMed=11044560;
 RA Benarafa C., Cunningham F.M., Hamblin A.S., Horohov D.W.,
 RA Collins M.E.;

GenCore version 4.5
Copyright (c) 1993 - 2000 CompuGen Ltd.

OM protein - protein search, using sw model

Run on: August 12, 2002, 10:46:59 ; Search time 30.03 Seconds
(without alignments)
266.311 Million cell updates/sec

Title: US-09-537-859B-2_COPY_28_99

Perfect score: 386
Sequence: 1 VSIPITCCFNVINRKIPQR.....ERWRDSMKHDIJFONLRP 72

Scoring table:
BLOSUM62
Gapop 10.0 , Gapext 0.5

Searched: 747574 seqs, 111073796 residues

number of hits satisfying chosen parameters: 747574

Minimum DB seq length: 0
Maximum DB seq length: 2000000000

Post-processing: Minimum Match 0%
Maximum Match 100%
Listing first 45 summaries

Database : A_Geneseq_032802.*
1: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1980.DAT.*
2: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1981.DAT.*
3: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1982.DAT.*
4: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1983.DAT.*
5: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1984.DAT.*
6: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1985.DAT.*
7: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1986.DAT.*
8: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1987.DAT.*
9: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1988.DAT.*
10: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1989.DAT.*
11: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1990.DAT.*
12: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1991.DAT.*
13: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1992.DAT.*
14: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1993.DAT.*
15: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1994.DAT.*
16: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1995.DAT.*
17: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1996.DAT.*
18: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1997.DAT.*
19: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1998.DAT.*
20: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA1999.DAT.*
21: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA2000.DAT.*
22: /SIDSI/gcgdata/hold-geneseq/geneeqp-emb1/AA2001.DAT.*

Pred. No. is the number of results predicted by chance to have a
score greater than or equal to the score of the result being printed,
and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB ID	Description
1	386	100.0	76	21	AA169031
2	386	100.0	77	21	AA15786
3	386	100.0	99	20	AA105300
4	386	100.0	99	20	AA107233
5	386	100.0	99	19	AA107237
6	386	100.0	109	19	AA107234
7	386	99.0	71	20	AA107232
8	382	99.0	71	20	AA107238
9	382	99.0	109	18	AA106535
10	363	94.0	77	20	AA114223
11	348	90.2	72	16	AA10804

12	267	69.2	74	21	AA169023
13	267	69.2	97	17	AA100667
14	267	69.2	97	18	AA104990
15	267	69.2	97	18	AA110099
16	267	69.2	97	21	AA15794
17	267	69.2	323	21	AA169058
18	267	69.2	325	21	AA169059
19	267	69.2	330	21	AA169060
20	249	64.5	76	10	AA190292
21	249	64.5	76	13	AA128660
22	249	64.5	76	16	AA187680
23	249	64.5	76	16	AA187677
24	249	64.5	76	17	AA109374
25	249	64.5	76	18	AA11131
26	249	64.5	76	19	AA10175
27	249	64.5	76	21	AA12818
28	249	64.5	76	21	AA169030
29	249	64.5	77	16	AA186859
30	249	64.5	99	10	AA195387
31	249	64.5	99	13	AA128663
32	249	64.5	99	16	AA173914
33	249	64.5	99	16	AA170800
34	249	64.5	99	19	AA140174
35	249	64.5	99	20	AA148391
36	249	64.5	99	20	AA126176
37	249	64.5	99	21	AA15785
38	249	64.5	99	22	AA197914
39	249	64.5	325	21	AA169049
40	249	64.5	327	21	AA169050
41	249	64.5	332	21	AA169051
42	246	63.7	69	18	AA13596
43	245	63.5	99	11	AA106398
44	241	62.4	76	16	AA187676
45	241	62.4	104	19	AA156088

ALIGNMENTS

RESULT 1
ID AA169031 standard; protein; 76 AA.

AC AA169031:

DT 30-MAY-2000 (first entry)

DE Amino acid sequence of chemokine receptor ligand MCP-2.

XX Chemokine receptor; ligand; inflammatory response; immune effector cell;

KW secondary tissue damage; central nervous system injury; MCP-2;

KW CNS inflammatory disease; neurodegenerative disorder; heart disease;

KW inflammatory eye disease; inflammatory bowel disease;

KW inflammatory joint disease; inflammatory kidney; renal disease;

KW inflammatory lung disease; inflammatory nasal disease;

KW inflammatory thyroid disease; thyroiditis; cytokine-regulated cancer.

XX Homo sapiens.

OS W0200004926-A2.

PD 03-FEB-2000.

XX 21-JUL-1999; 99MO-CA00659.

XX 22-JUL-1998; 98US-0120523.

XX (OSPR-) OSPREY PHARM LTD.

XX McDonald JR, Cogkins PJ;

XX WPI: 2000-182542/16.

Amino acid sequenc
Pancreas expressed
Human eosinocyte C
Human eotaxin. Ho
Human chemokine eo
A chemokine recept
A chemokine recept
A chemokine recept
Peptide from human
MCF. Synthetic.
Monocyte chemotact
(3-Ala) MCP-1. Ho
Monocyte chemotact
Mature human monoc
Macrophage chemot
Human glioma cell
Amino acid sequenc
Mature MCP-1. Hom
Human monocyte che
MCF. Synthetic.
Human monocyte che
Chemottractant pr
Macrophage chemot
Human prostate can
Monocyte chemotact
Human chemokine MC
Human monocyte che
A chemokine recept
A chemokine recept
Monocyte chemotact
Human MCP precursor
(24-Arg) MCP-1. H
Murine monocyte ch

PT A new therapeutic agent comprising a conjugate for treating secondary
PT tissue damage and other disease conditions like Alzheimer's disease,
PT stroke, Parkinson's disease and atherosclerosis
XX
XX
PS Disclosure: Page 60; 204pp; English.

CC The present sequence represents a chemokine receptor ligand. The present
CC ligand can be incorporated into the conjugates of the invention. The
CC specification describes a conjugate, comprising a targeted agent and a
CC chemokine receptor ligand. The conjugate binds to a chemokine receptor
CC resulting in internalisation of the targeted agent in cells bearing the
CC receptor. The conjugates are used for formulating a medicament or for
CC treating disorders associated with inflammatory responses resulting from
CC activation, proliferation and migration of immune effector cells. The
CC disorders or disease states comprise secondary tissue damage such as
CC central nervous system (CNS) injury, CNS inflammatory diseases,
CC neurodegenerative disorders, heart disease, inflammatory eye diseases,
CC inflammatory bowel diseases, inflammatory joint diseases, inflammatory
CC kidney or renal diseases, inflammatory lung diseases, inflammatory
CC nasal diseases, inflammatory thyroid disease such as thyroiditis, or
XX cytokine-regulated cancers.

SQ Sequence 76 AA;

Query Match 100.0%; Score 386; DB 21; Length 76;
Best Local Similarity 100.0%; Pred. No. 6e-39;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPRIORLESYTRITNIQCPKEAVIFKTRKKEVCADPKERWVDSM 60
Db 5 vsipitccfnvinrkkiprioriesytrilniqcpkeavifktrkgykvcadpkerwvrdsm 64
|||||
OY 61 KHLDOIIONLKP 72
|||||
Db 65 khlqdlifgnlkp 76

RESULT 2

ID AAB15786 standard; protein; 77 AA.

AC AAB15786;

DT 17-JAN-2001 (first entry)

DE Human chemokine MCP-2 SEQ ID NO: 17.

XX Macrophage recruitment; chemokine derivative; MCP-1; osteoporosis;
XX monocyte chemoattractant protein-1; inflammation; atherosclerosis; HIV;
XX AIDS; stroke; psoriasis; autoimmune disease; hypertension; endotoxaemia;
XX basophil-mediated disease; myocardial infarction; acute ischaemia;
XX rheumatoid arthritis; contraception.

OS Homo sapiens.

XX Key Location/Qualifiers

FT Misc-difference 47 /note="encoded by CAA"

XX MO200042071-A2.

XX 20-JUL-2000.

XX 12-JAN-2000; 2000MO-US00821.

XX 12-JAN-1999; 99US-0229071.

XX 17-MAR-1999; 99US-0271192.

XX 01-DEC-1999; 99US-0452406.

XX (NEOR-) NEORX CORP.

XX Grainger DJ, Tatalick LM;

XX WPI; 2000-499101/44.
DR N-PSDB; AAA74886.

PT New peptide 3, amide and heterocyclic compounds and saccharide
PT conjugates used for inhibiting chemokine induced activity and for
PT treating e.g. stroke, vascular diseases, autoimmune diseases and tumour
XX growth

XX Example 1; Page 134; 387pp; English.

CC The present invention concerns the identification of a number of
CC chemokines which can be used to produce derivatives, agonists and
CC antagonists which are then useful in disease treatment. The chemokines
CC include sequences AAB15785-B15794, AAB15803-B15813 and AAB15831-B15848.
CC These chemokine derivatives can be used to treat diseases such as
CC autoimmune diseases, atherosclerosis, osteoporosis, HIV infection and
CC AIDS, psoriasis, inflammatory diseases, hypertension, basophil-mediated
CC diseases, endotoxaemia, myocardial infarction, acute ischaemia and
CC rheumatoid arthritis, and can be used to prevent strokes and as
CC contraceptives. The coding sequences for the chemokines can be used in
CC gene therapy for the same diseases, as well as in the production of
XX animal models.

SQ Sequence 77 AA;

Query Match 100.0%; Score 386; DB 21; Length 77;
Best Local Similarity 100.0%; Pred. No. 6.1e-39;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPRIORLESYTRITNIQCPKEAVIFKTRKKEVCADPKERWVDSM 60
Db 6 vsipitccfnvinrkkiprioriesytrilniqcpkeavifktrkgykvcadpkerwvrdsm 65
|||||

OY 61 KHLDOIIONLKP 72
|||||

Db 66 khlqdlifgnlkp 77

RESULT 3

ID AAY05300 standard; protein; 99 AA.

AC AAY05300;

DT 25-JUN-1999 (first entry)

DE C-C chemokine, MCP2.

XX C-C chemokine; RANTES; MCP2; chemokine antagonist; inflammatory disease;
XX HIV infection; tumour; angiogenesis-related disease; autoimmune disease;
XX haematopoiesis-related disease; CD26/DPP IV; immune disease; diagnosis;
XX atherosclerosis; pulmonary disease; skin disorder; therapy.

OS Homo sapiens.

XX EP905240-A1.

XX 31-MAR-1999.

XX 19-DEC-1997; 97EP-0122471.

XX 29-SEP-1997; 97EP-0116863.

XX (ISTF) ARS APPLIED RES SYSTEMS HOLDING NV.

XX Proost P, Struyf S, Van Damme J;

XX WPI; 1999-216695/19.

XX New amino-terminally truncated C-C chemokines have antagonistic
PT activity, for treatment of immune, inflammatory and infectious

PT diseases
XX
PS
XX
XX

Claim 4; Fig 1; 30pp; English.

CC This sequence represents the C-C chemokine MCP2. The invention relates
CC to amino-terminally truncated C-C chemokines, having chemokine
CC antagonistic activity. The truncated chemokines are specifically
CC residues 26 to 91 of the RANTES sequence (see AAY05299) or residues 29 to
CC 99 of the MCP2 sequence (this sequence). The new chemokines are useful
CC as medicaments, for diagnosis and/or treatment of diseases which require
CC antagonistic activity of a chemokine e.g. inflammatory diseases, HIV
CC infection, tumours, and angiogenesis- and hematopoiesis-related
CC diseases. The invention also relates to the use of CD26/DP IV for
CC treatment of inflammatory, immune and infectious diseases, including
CC autoimmune diseases, atherosclerosis, pulmonary diseases and skin
CC disorders.

XX
SQ Sequence 99 AA:

Query Match 100.0%; Score 386; DB 20; Length 99;
Local Similarity 100.0%; Pred. No. 8.2e-39;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 VSIPITCCFNVINRKIPIDQRLSEYTRITNIQCPKEAVIFKTKRGKVCADPKERWVRDSM 60
DB 28 vsipitccfnvinrkpikpdlqrlseyltrilnigpkeavifktrgkvcadpkervvrdsm 87
QY 61 KHLDOIIONLKP 72
DB 88 khlldqifgnlkp 99

RESULT 4

AAV07233 standard; protein; 99 AA.

XX
AC AAY07233;

XX
DT 06-JUL-1999 (first entry)

XX
DE Wild type monocyte chemotactic protein 2.

XX
KW Wild type; C-C chemokine; monocyte chemotactic protein 2; MCP2; HIV;
KW regulated on activation normal T-cell expressed and secreted; RANTES;
KW truncation; antagonist; medicaments; diagnosis; inflammation; infection;
KW tumour; angiogenesis; hematopoiesis; autoimmune disease; atherosclerosis;
KW pulmonary disease; skin disorder.

XX
OS Homo sapiens.

XX
PN EP906954-A1.

XX
PD 07-APR-1999.

XX
PF 29-SEP-1997; 97EP-0116863.

XX
PR 29-SEP-1997; 97EP-0116863.

XX
PA (ISTF) ARS APPLIED RES SYSTEMS HOLDING NV.

XX
PI Proost P, Struyf S, Van Damme J;

XX
DR WPI; 1999-207108/18.

XX
PT New amino-terminally truncated C-C chemokines have antagonistic
PT activity for treatment of immune, inflammatory and infectious
PT diseases

XX
PS Disclosure; Fig 1; 29pp; English.

XX
CC This sequence represents the wild type C-C chemokine monocyte chemotactic
CC protein 2 (MCP2). The invention relates the generation of amino-terminal

CC truncated C-C chemokines, having chemokine antagonistic activity. The
CC new chemokines are useful as medicaments, for diagnosis and/or treatment
CC of diseases which require antagonistic activity of a chemokine e.g.
CC inflammatory diseases, HIV infection, tumours, and angiogenesis- and
CC hematopoiesis-related diseases, including auto-immune diseases,
CC atherosclerosis, pulmonary diseases and skin disorders.

XX
SQ Sequence 99 AA:

Query Match 100.0%; Score 386; DB 20; Length 99;
Best Local Similarity 100.0%; Pred. No. 8.2e-39;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 VSIPITCCFNVINRKIPIDQRLSEYTRITNIQCPKEAVIFKTKRGKVCADPKERWVRDSM 60
DB 28 vsipitccfnvinrkpikpdlqrlseyltrilnigpkeavifktrgkvcadpkervvrdsm 87
QY 61 KHLDOIIONLKP 72
DB 88 khlldqifgnlkp 99

RESULT 5

AAV07237 standard; protein; 99 AA.

XX
AC AAY07237;

XX
DT 06-JUL-1999 (first entry)

XX
DE Wild type monocyte chemotactic protein 2.

XX
KW Wild type; C-C chemokine; monocyte chemotactic protein 2; MCP2; HIV;
KW regulated on activation normal T-cell expressed and secreted; RANTES;
KW truncation; antagonist; medicaments; diagnosis; inflammation; infection;
KW tumour; angiogenesis; hematopoiesis; autoimmune disease; atherosclerosis;
KW pulmonary disease; skin disorder.

XX
OS Homo sapiens.

XX
PN EP905241-A1.

XX
PD 31-MAR-1999.

XX
PF 10-MAR-1998; 98EP-0104216.

XX
PR 19-DEC-1997; 97EP-0122471.

XX
PR 29-SEP-1997; 97EP-0116863.

XX
PA (ISTF) ARS APPLIED RES SYSTEMS HOLDING NV.

XX
PI Proost P, Struyf S, Van Damme J;

XX
DR WPI; 1999-206774/18.

XX
PT New amino-terminally truncated C-C chemokines have antagonistic
PT activity for treatment of immune, inflammatory and infectious
PT diseases

XX
PS Disclosure; Fig 1; 36pp; English.

XX
CC This sequence represents the wild type C-C chemokine monocyte chemotactic
CC protein 2 (MCP2). The invention relates the generation of amino-terminal
CC truncated C-C chemokines, having chemokine antagonistic activity. The
CC new chemokines are useful as medicaments, for diagnosis and/or treatment
CC of diseases which require antagonistic activity of a chemokine e.g.
CC inflammatory diseases, HIV infection, tumours, and angiogenesis- and
CC hematopoiesis-related diseases, including auto-immune diseases,
CC atherosclerosis, pulmonary diseases and skin disorders.

XX
SQ Sequence 99 AA:

Query Match 100.0%; Score 386; DB 20; Length 99;
Best Local Similarity 100.0%; Pred. No. 8.2e-39;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 VSIPITCCFNVINRKIPIDRLSEYTRITNIOCPKEAVIFKTRGKVCADPKERWVDSM 60
DB 28 vsipitccfnvinrkkipidrlseylrltnlqcpkeavifktrgkvcadpkervwds 87
QY 61 KHLDOIFONLKP 72
DB 88 khlldqifgnlkp 99

RESULT 6

AAW42072
ID AAW42072 standard; Protein: 109 AA.
AC AAW42072;

09-JUN-1998 (first entry)

DE Human MC proprotein.

KW Human monocyte chemotactic proprotein; MCP; Incyte clone; allergy;
KW macrophage; diagnostic assay; body fluid; lung; biopsy;
KW autoimmune disease; AIDS; asthma; rheumatoid arthritis; NIDDM;
breast cancer; bladder.

OS Homo sapiens.

PN W09802459-A1.

PD 22-JAN-1998.

PF 15-JUL-1997; 97WO-US12349.

PR 15-JUL-1996; 96US-0683655.

PA (INCY-) INCYTE PHARM INC.

PI Au-Young J, Coleman R, Hillman JL;

DR WPI: 1998-110529/10.

DR N-PSDB; AAW09218.

PT New human monocyte chemotactic proprotein - has homology to CC
chemokine(s) useful for identifying agent for treating auto-immune
diseases or allergic responses

PS Claim 1; Pages 38-39; 53pp; English.

CC The is a human monocyte chemotactic proprotein sequence. Its cDNA was
CC first identified in Incyte clone 965517 from a breast cDNA library.
CC Antisense nucleotides can be used to control human MCP expression.
CC especially where it may lead to inappropriate monocyte or macrophage
CC activity causing damage associated with allergic responses to organs
CC such as the lungs. Antisense nucleotides and MCP cDNA may be used
CC in diagnostic assays of body fluids or biopsied tissues to detect
CC expression levels of MCP. MCP cDNA may also be useful for
CC treatment of disorders such as asthma, rheumatoid arthritis, NIDDM
CC or cancer of the breast or bladder. Human MCP protein can be used to
CC identify agonists, antagonists or inhibitors to modulate the activity of
CC MCP in allergic responses or autoimmune diseases such as AIDS.

SO Sequence 109 AA;

Query Match

Best Local Similarity 100.0%; Score 386; DB 19; Length 109;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 VSIPITCCFNVINRKIPIDRLSEYTRITNIOCPKEAVIFKTRGKVCADPKERWVDSM 60

DB 38 vsipitccfnvinrkkipidrlseylrltnlqcpkeavifktrgkvcadpkervwds 97

QY 61 KHLDOIFONLKP 72

DB 98 khlldqifgnlkp 109

RESULT 7

AAW07234
ID AAW07234 standard; protein: 71 AA.
AC AAW07234;

06-JUL-1999 (first entry)

DE Truncated monocyte chemotactic protein 2 (6-76).

KW Wild type; C-C chemokine; monocyte chemotactic protein 2; MCP2; HIV;
KW regulated on activation normal T-cell expressed and secreted; RANTES;
KW truncation; antagonist; medicaments; diagnosis; inflammation; infection;
KW tumour; angiogenesis; hematopoiesis; autoimmune disease; atherosclerosis;
KW pulmonary disease; skin disorder.

OS Homo sapiens.

PN Synthetic.

PN EP06954-A1.

PD 07-APR-1999.

PF 29-SEP-1997; 97EP-0116863.

PR 29-SEP-1997; 97EP-0116863.

PA (ISTP) ARS APPLIED RES SYSTEMS HOLDING NV.

PI Proost P, Struyf S, Van Damme J;

DR WPI: 1999-207108/18.

PT New amino-terminally truncated C-C chemokines have antagonistic
PT activity for treatment of immune, inflammatory and infectious
PT diseases

PS Claim 4; Fig 1; 29pp; English.

CC This sequence represents a truncated C-C chemokine monocyte chemotactic
CC protein 2 (MCP2) containing amino acids 6-76 of the mature protein.
CC The invention relates the generation of amino-terminal truncated C-C
CC chemokines, having chemokine antagonistic activity. The new chemokines
CC are useful as medicaments, for diagnosis and/or treatment of diseases
CC which require antagonistic activity of a chemokine e.g. inflammatory
CC related diseases, HIV infection, tumours, and angiogenesis and hematopoiesis-
CC pulmonary diseases, including auto-immune diseases, atherosclerosis,
CC and skin disorders.

SO Sequence 71 AA;

Query Match 99.0%; Score 382; DB 20; Length 71;
Best Local Similarity 100.0%; Pred. No. 1.7e-38;
Matches 71; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 2 SIPTCCFNVINRKIPIDRLSEYTRITNIOCPKEAVIFKTRGKVCADPKERWVDSM 61

DB 1 sipitccfnvinrkkipidrlseylrltnlqcpkeavifktrgkvcadpkervwds 60

QY 62 HLDIOFONLKP 72

DB 61 hldiofognlkp 71

KW Chemokine; immune response; monocyte chemoattractant protein-1; MCP-1;
KW Chemokine-induced activity; inflammatory response; vascular indication;
KW haematopoietic cell-associated activity; tumour; coronary artery disease;
KW myocardial infarction; unstable angina pectoris; atherosclerosis; asthma;
KW vasculitis; lentiviral infection; low bone mineral density; suppressor;
KW parasitic infection; autoimmune disease; psoriasis; wound healing;
KW organ transplant rejection; rheumatoid arthritis; allergy; therapy;
KW arachidonic acid pathway.
XX
XX Homo sapiens.
XX
XX MO9912968-A2.
XX
XX 18-MAR-1999.
XX
XX 11-SEP-1998; 98WO-US19052.
XX
XX 11-SEP-1997; 97US-0927939.
XX
XX (NEOR-) NEORX CORP.
XX
XX Grainger DJ, Kanaly ST, Tatalick LM;
XX WPI: 1999-347124/29.
XX
XX New chemokine peptides and mimetics
XX
XX Example 1; Page 128; 208pp; English.
XX
XX This sequence represents the chemokine hMCP-2.
XX The invention relates to chemokine peptides and mimetics, particularly
XX derived from monocyte chemoattractant protein-1 (MCP-1). The chemokine
XX peptides and variants and derivatives can inhibit or reduce or increase,
XX or enhance chemokine-induced activity. They can be used for increasing or
XX enhancing an inflammatory response, an immune response or haematopoietic
XX cell-associated activity at a tumour site. They can also be used for
XX preventing or inhibiting an indication associated with haematopoietic
XX cell recruitment or histamine release from basophils or mast cells. They
XX can also be used to modulate the chemokine-induced activity of
XX haematopoietic cells at a preselected physiological site, to treat a
XX vascular indication, e.g. coronary artery disease, myocardial infarction,
XX unstable angina pectoris, atherosclerosis, or vasculitis, lentiviral
XX infection or replication (e.g. HIV), low bone mineral density, a
XX parasitic infection in a vertebrate animal (e.g. malaria), an autoimmune
XX disease, to suppress tumour growth in a vertebrate animal, to prevent or
XX treat psoriasis in a mammal, to enhance wound healing, to prevent or
XX treat asthma, organ transplant rejection, rheumatoid arthritis or
XX allergy. They can also be used to inhibit a product or intermediate in
XX the arachidonic acid pathway and where leukotriene, thromboxane and/or
XX prostaglandin are inhibited and to prevent or inhibit an indication
XX associated with elevated TNF-alpha.
XX
XX Sequence 77 AA;
SQ

Query Match 94.0%; Score 363; DB 20; Length 77;
Best Local Similarity 95.8%; Pred. No. 3.6e-36;
Matches 69; Conservative 0; Mismatches 3; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVRKIPRIORLESYTRITNIOCPKEAVIFKTRGKGCADPKERWRVDSM 60
DB 6 vsipitccfnvrnkripriqrlsyrtrltinlqpcpkeavifktrgkcvadpkerwrvdsm 65
OY 61 KHLDDIFQNLKP 72
DB 66 khldqifgnlkp 77

RESULT 11
AA070804
ID AAR70804 standard; Protein: 72 AA.
XX
XX AAR70804;

XX
XX 29-ANG-1995 (first entry)
XX
XX Chemoattractant MCP-2.
XX
XX Chemoattractant MCP-2;
XX Chemotactant; MCP-2; heparanase; heparin; heparan sulfate;
XX arthritis; restenosis; cancer; wound healing.
XX
XX Homo sapiens.
XX
XX MO9504158-A.
XX
XX 09-FEB-1995.
XX
XX 26-JUL-1994; 94WO-US08207.
XX
XX 29-JUL-1993; 93US-0099866.
XX
XX 13-OCT-1993; 93US-0136117.
XX
XX (UPJO) UPJOHN CO.
XX
XX Hoogwerf AJ, Ledbetter SR;
XX WPI: 1995-082239/11.
XX
XX Screening for cpds. with anti-heparanase activity - by detecting
XX inhibition of heparin or heparan sulphate degradation,
XX potentially useful for treating arthritis, restenosis, cancer.
XX
XX Claim 13; Page 53; 60pp; English.
XX
XX Purified heparanases, prepared under reducing conditions and
XX activated with transglutaminase, are given in AAR70786-804. Most
XX are prepared by reverse transcription of mRNA from activated human
XX leukocytes, then cloning of the cDNA into pVL392 baculovirus
XX vector, and expression in Sf9 cells in the presence of reduced
XX glutathione and dithiothreitol.
XX
XX Sequence 72 AA;
SQ

Query Match 90.2%; Score 348; DB 16; Length 72;
Best Local Similarity 94.4%; Pred. No. 2.1e-34;
Matches 68; Conservative 0; Mismatches 2; Indels 2; Gaps 1;

OY 1 VSIPITCCFNVRKIPRIORLESYTRITNIOCPKEAVIFKTRGKGCADPKERWRVDSM 60
DB 3 vsipitccfnvrnkripriqrlsyrtrltinlqpcpkeavifktrgkcvadpkerwrvdsm 60
OY 61 KHLDDIFQNLKP 72
DB 61 khldqifgnlkp 72

RESULT 12
AA069023
ID AAY69023 standard; Protein: 74 AA.
XX
XX AAY69023;
XX
XX 30-MAY-2000 (first entry)
XX
XX Amino acid sequence of chemokine receptor ligand eotaxin.
XX
XX Chemokine receptor; ligand; inflammatory response; immune effector cell;
XX secondary tissue damage; central nervous system injury; eotaxin;
XX CNS inflammatory disease; neurodegenerative disorder; heart disease;
XX inflammatory eye disease; inflammatory bowel disease;
XX inflammatory joint disease; inflammatory kidney; renal disease;
XX inflammatory lung disease; inflammatory nasal disease;
XX inflammatory thyroid disease; thyroiditis; cytokine-regulated cancer.
XX
XX Homo sapiens.
OS

XX	PN	WO200004926-A2.
XX	PD	03-FEB-2000.
XX	PF	21-JUL-1999; 99WO-CA00659.
XX	PR	22-JUL-1998; 98US-0120523.
XX	PA	(OSPR-) OSPREY PHARM LTD.
XX	PI	McDonald JR, Coggins PJ;
XX	DR	WPI: 2000-182542/16.
XX	PT	A new therapeutic agent comprising a conjugate for treating secondary
XX	PT	tissue damage and other disease conditions like Alzheimer's disease,
XX	PT	stroke, Parkinson's disease and atherosclerosis
XX	PS	Disclosure; Page 59; 204pp; English.
XX	CC	The present sequence represents a chemokine receptor ligand. The present
XX	CC	ligand can be incorporated into the conjugates of the invention. The
XX	CC	specification describes a conjugate, comprising a targeted agent and a
XX	CC	chemokine receptor ligand. The conjugate binds to a chemokine receptor
XX	CC	resulting in internalisation of the targeted agent in cells bearing the
XX	CC	receptor. The conjugates are used for formulating a medicament or for
XX	CC	treating disorders associated with inflammatory responses resulting from
XX	CC	activation, proliferation and migration of immune effector cells. The
XX	CC	disorders or disease states comprise secondary tissue damage such as
XX	CC	central nervous system (CNS) injury, CNS inflammatory diseases,
XX	CC	neurodegenerative disorders, heart disease, inflammatory eye diseases,
XX	CC	inflammatory bowel diseases, inflammatory joint diseases, inflammatory
XX	CC	kidney or renal diseases, inflammatory lung diseases, inflammatory
XX	CC	nasal diseases, inflammatory thyroid disease such as thyroiditis, or
XX	CC	cytokine-regulated cancers.
SO	Sequence	74 AA;
Query Match	69.2%;	Score 267; DB 21; Length 74;
Best Local Similarity	66.2%;	Pred. No. 1, 2e-24;
Matches 47; Conservative 13; Mismatches 11; Indels 0; Gaps 0.		
OY	2	SIPTCCFVFNINKRIPQRLESTRTITNOCPEKAVIFPKRKEGVCADPKERWVDSMK 61
DB	4	SVPTCCFANLANKIPQRIESTRTITNOCPEKAVIFPKRKEGVCADPKERWVDSMK 63
OY	62	HLDDIFONLKP 72
DB	64	YLDGKSPKPK 74
RESULT 13		
AA000667		
ID	AA000667	standard; Protein; 97 AA.
AC	AA000667;	
XX	02-MAY-1997	(first entry)
XX	Pancreas expressed chemokine-1.	
XX	Pancreas derived chemokine; PANEC-1; PANEC-2; diagnosis;	
XX	Inflammation; disease; cancer.	
XX	Homo sapiens.	
XX	MO9625497-A1.	
XX	22-AUG-1996.	
XX	16-FEB-1996;	96WO-US02225.

XX 17-FEB-1995; 95US-0390740.
PR
XX
XX (INCYTE PHARM INC.
PA
XX
XX Bandman O, Coleman R, Wilde CG;
PI
XX
XX WPI: 1996-393398/39.
DR N-PSDB: AAT33527.
XX
XX
XX Nucleotide and protein sequences for human PANEC-1 and PANEC-2 -
PT useful in diagnosis and therapy of pancreatic diseases
PS
PS Claim 8: Page 28-29; 43pp; English.

XX
XX The sequences given in AAM00667-68 represent pancreas-derived
CC chemokines, PANEC-1 and PANEC-2. These chemokines are highly expressed
CC and specifically expressed in the pancreas and may therefore be used in
CC diagnostic assays based on chemokine production in cases of
CC inflammation or disease affecting the pancreas. These assays allow
CC the early and accurate diagnosis of pancreatic disorders, and can
CC differentiate between invasive diseases and genetic syndromes.
XX

SQ Sequence 97 AA;

	Query Match	69.2%	Score 267;	DB 17;	Length 97;	
	Best Local Similarity	66.2%	Pred No. 1.7e-24;			
	Matches 47;	Conservative 13;	Mismatches 11;	Indels 0;	Gaps 0;	
OY	2 SIPTCCGFNVNKRKIPIQRLSESYTRITNIQCFKEAVIFKTKRGKEVCADKREKRWDRSMK 61					
Dd	27 svptccnclanlrkrlplqrlesyrirtsqgkcpkaviktklakdlcadpkkkwvqdsmk 86					
OY	62 HLDQIFQNLKP 72					
Dd	87 yldqksrptpxp 97					
	RESULT 14					
AAMW14990	ID AAWI4990 standard; Protein; 97 AA.					
XX	'					
AC	AAWI4990;					
XX						
DT	01-DEC-1997 (first entry)					
XX						
DE	Human eosinocyte CC type chemokine eotaxin.					
KW	Human; eosinocyte; CC type; chemokine; eotaxin; calcium; skin;					
KW	small intestine; agonist; screening; inflammation;					
KW	antibody; diagnosis; assay; disorder; asthma; allergy; atopic.					
OS	Homo sapiens.					
XX						
PN	WO9712914-A1.					
XX						
PD	10-APR-1997.					
XX						
PF	01-OCT-1996; 96WO-JP02851.					
XX						
PR	28-FEB-1996; 96JP-0041965.					
XX						
PA	05-OCT-1995; 95JP-0259067.					
XX						
(SHIO)	SHIONOGI & CO LTD.					
XX						
PI	Harada S, Kitaura M, Nakajima T;					
XX						
DR	WPI; 1997-226168/20.					
XX						
N-P	SDB; AAT62944.					
XX						
Human CC	chemokine (eotaxin) active on eosinocytes - useful for					
screening	for eotaxin (antagonist(s), e.g. for treating					

PT Inflammation
 XX
 XX
 PS Claim 2; Pages 27-28; 45pp; Japanese.
 XX
 CC The present sequence is the human eosinocyte, CC type
 CC chemokine, eotaxin, which increases calcium flux in human
 CC eosinocytes and is a human analogue of guinea pig eotaxin. The
 CC eotaxin was derived from human small intestine, and is a specific
 CC agonist for human CC type chemokine receptor 3. It may be used to
 CC screen potential agonists and antagonists, which may be useful as
 CC anti-inflammatory agents. An anti-eotaxin antibody may be used in
 CC diagnostic assays for eotaxin, which is implicated in inflammatory
 CC disorders, e.g. asthma, other allergies and atopic skin
 CC inflammation.
 CC
 CC Sequence 97 AA:
 SQ
 Query Match 69.2%; Score 267; DB 18; Length 97;
 Best Local Similarity 66.2%; Pred. No. 1.7e-24;
 Matches 47; Conservative 13; Mismatches 11; Indels 0; Gaps 0;
 QY 2 SIPTCCFNVIRKPIQRIESTRINIOCPKEAVIFKTRKEVCADPKERWVDSMK 61
 Db 27 svpttcnfnanrkpiqriestyriltsyrgkcpkavifkklakdicadpkkkvwgdsnk 86
 QY 62 HLDQIFQNLKP 72
 Db 87 yldgkspkpkp 97
 RESULT 15
 AAM10099
 ID AAM10099 standard; Protein; 97 AA.
 XX
 AC AAM10099;
 DT 30-SEP-1997 (first entry)
 XX
 DE Human eotaxin.
 XX
 XX Human; eotaxin; eosinophil; chemoattractant; stimulation;
 KW accumulation; attraction; chemotaxis; diagnosis; prevention;
 KW treatment; disease; inflammation; allergy; asthma; rhinitis;
 KW hypersensitivity; lung; pneumonia; Loeffler's; syndrome;
 KW interstitial; ILD; idiopathic pulmonary fibrosis;
 KW rheumatoid arthritis; systemic; lupus erythematosus; SLE;
 KW ankylosing spondylitis; sclerosis; Sjorgen's; polymyositis;
 KW dermatomyositis; bowel; anaphylaxis; drug; penicillin;
 KW cephalosporin; insect sting; Crohn's; ulcerative colitis;
 KW spondyloarthritis; scleroderma; psoriasis; dermatosis;
 KW dermatitis; eczema; atopic; urticaria; necrotizing; cutaneous;
 KW vasculitis; myositis; fasciitis; multiple sclerosis;
 KW myasthenia gravis; juvenile onset diabetes; glomerulonephritis;
 KW autoimmune; thyroiditis; Bechet's; graft; rejection;
 KW transplantation; allograft; graft versus host; cancer;
 KW leukocyte infiltration; reperfusion injury; atherosclerosis;
 KW haematologic malignancy; septic; endotoxic; shock;
 KW polymyositis; dermatomyositis; immunosuppression; immunodeficiency;
 KW AIDS; radiation therapy; chemotherapy; autoimmune; corticosteroid;
 KW infection.
 KW
 XX Homo sapiens.
 OS
 XX
 PN MO9700960-A1.
 XX
 PD 09-JAN-1997.
 XX
 XX 21-JUN-1996; 96WO-US10723.
 PF
 XX 23-JUN-1995; 95US-0494093.
 PR
 XX (LEUK-) LEUKOSTE INC.
 PA

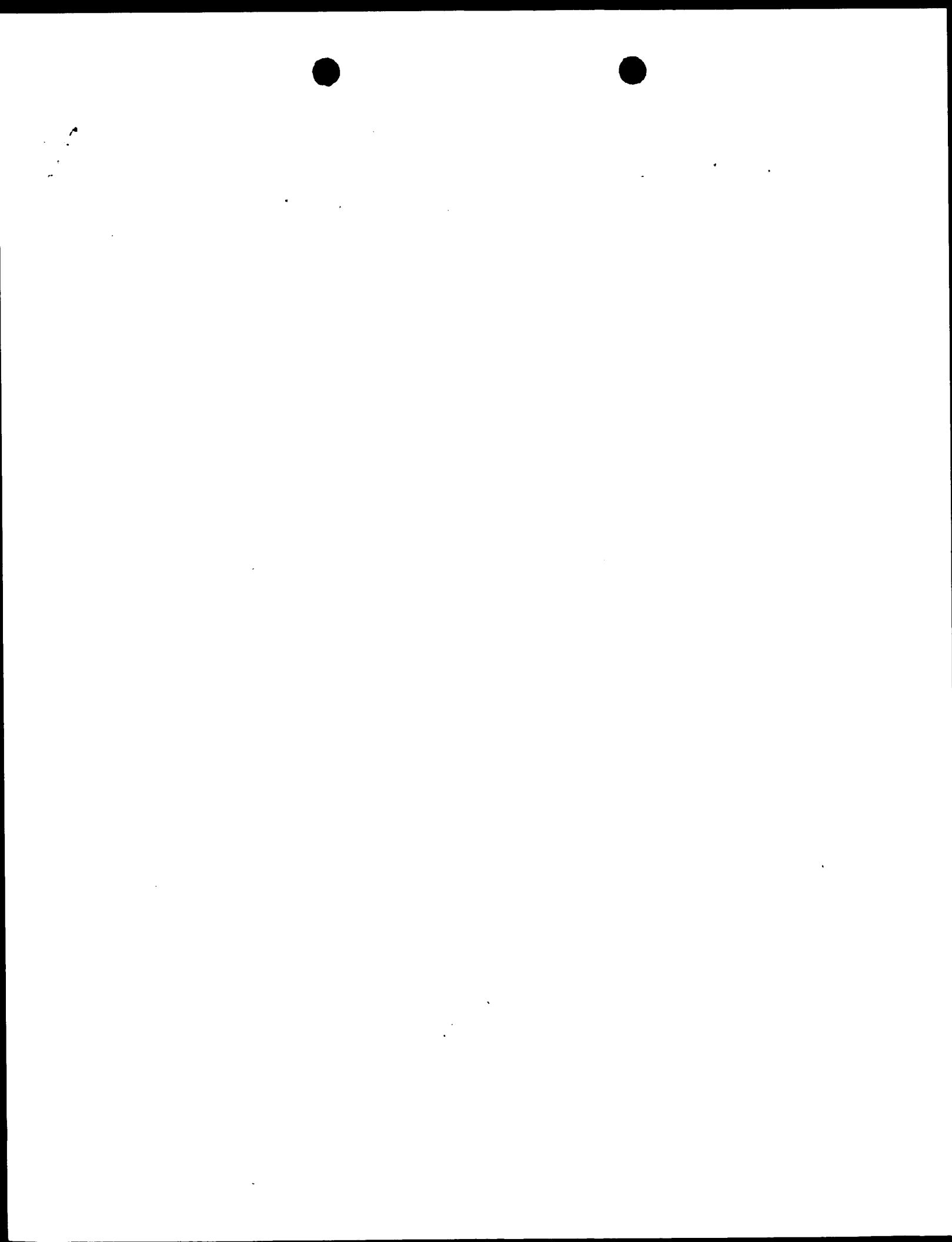
XX
 PI Mackay C, Newman W, Ponath PD, Qin S, Ringler DJ;
 XX
 DR WPI: 1997-087387/08.
 DR N-PSDB: AAT56777.
 DR
 PT New isolated human eotaxin gene - used to develop prods. for the
 CC diagnosis and treatment of e.g. inflammation, allergies, auto-immune
 CC disease, infections and tumours
 CC
 CC Claim 3; Pages 95-96; 130pp; English.
 CC
 CC The present sequence is human eotaxin (he), an eosinophil
 CC specific chemoattractant capable of stimulating eosinophil
 CC accumulation and/or attracting eosinophils (including chemotaxis).
 CC It can be used to develop products for the diagnosis, prevention or
 CC treatment of he associated diseases or conditions. The products can
 CC be used to treat inflammatory or allergic diseases and conditions,
 CC including respiratory allergic diseases (e.g. asthma, allergic
 CC rhinitis, hypersensitivity lung diseases or pneumonitis,
 CC eosinophilic pneumonia, interstitial lung diseases (ILD) such as
 CC idiopathic pulmonary fibrosis or ILD associated with rheumatoid
 CC arthritis, systemic lupus erythematosus (SLE), ankylosing
 CC spondylitis, systemic sclerosis, Sjorgen's syndrome, polymyositis
 CC or dermatomyositis), systemic anaphylaxis or hypersensitivity
 CC responses, drug allergies (e.g. to penicillin and cephalosporins),
 CC insect sting allergies, inflammatory bowel diseases (e.g. Crohn's
 CC disease and ulcerative colitis), spondyloarthritis, psoriasis,
 CC scleroderma, psoriasis and inflammatory dermatoses (e.g.
 CC dermatitis, eczema, atopic dermatitis, allergic contact dermatitis,
 CC urticaria and necrotizing, cutaneous and hypersensitivity
 CC vasculitis), eosinophilic myositis and fasciitis, multiple
 CC sclerosis, SLE, myasthenia gravis, juvenile onset diabetes,
 CC glomerulonephritis, autoimmune thyroiditis, Bechet's disease, graft
 CC rejection (e.g. in transplantation) including allograft rejection or
 CC graft versus host disease and cancers with leukocyte infiltration
 CC of the skin or organs. The products can also be used to treat other
 CC diseases or conditions requiring the inhibition of undesirable
 CC inflammatory responses, including reperfusion injury,
 CC atherosclerosis, certain haematologic malignancies, cytokine
 CC induced toxicity (e.g. septic or endotoxic shock), polymyositis,
 CC dermatomyositis, immunosuppression (e.g. in individuals with
 CC immunodeficiency syndromes such as AIDS, undergoing radiation
 CC therapy, chemotherapy, therapy for autoimmune disease or other drug
 CC therapy, such as corticosteroid therapy, which cause
 CC immunosuppression), immunosuppression due to (e.g. congenital)
 CC deficiency (e.g. in eotaxin) or infectious diseases such as parasitic
 CC diseases.
 CC Degenerate primers based on the guinea pig eotaxin amino acid
 CC sequence were used for the reverse transcriptase polymerase chain
 CC reaction (RT-PCR) amplification of RNA isolated from inflamed
 CC eosinophilic lung tissue obtained from Balb/c mice sensitised to
 CC ovalbumin. The amplification product was used as a probe to screen
 CC a human genomic library in vector EMBL3 SP6/77 to obtain the he
 CC gene.
 CC
 CC Sequence 97 AA:
 SQ
 Query Match 69.2%; Score 267; DB 18; Length 97;
 Best Local Similarity 66.2%; Pred. No. 1.7e-24;
 Matches 47; Conservative 13; Mismatches 11; Indels 0; Gaps 0;
 QY 2 SIPTCCFNVIRKPIQRIESTRINIOCPKEAVIFKTRKEVCADPKERWVDSMK 61
 Db 27 svpttcnfnanrkpiqriestyriltsyrgkcpkavifkklakdicadpkkkvwgdsnk 86
 QY 62 HLDQIFQNLKP 72
 Db 87 yldgkspkpkp 97

Mon Aug 12 10:36:57 2002

us-09-537-859b-2_copy_28_99.rag

Page 9

Search completed: August 12, 2002, 10:47:58
Job time: 59 sec



GenCore version 4.5
Copyright (c) 1993 - 2000 Compugen Ltd.

OM protein - protein search, using sw model

Run on: August 12, 2002, 10:46:59 ; Search time 13.03 Seconds
(without alignments)
134,969 Million cell updates/sec

Title: US-09-537-859B-2_COPY_28_99

Perfect score: 386
Sequence: 1 VSIPITCCFNVIRKRIPIQR.....ERWRDSMKHLDGIFGNLKP 72

Scoring table:
BLOSUM62
Gapop 10.0 , Gapext 0.5

Searched: 231628 seqs, 24425594 residues

Minimum DB seq length: 0
Maximum DB seq length: 200000000

Post-processing: Minimum Match 0%
Maximum Match 100%
Listing first 45 summaries

Database :

- 1: /cgn2_6/ptodata/2/1aa/5A.COMB.pep:*
- 2: /cgn2_6/ptodata/2/1aa/5B.COMB.pep:*
- 3: /cgn2_6/ptodata/2/1aa/6A.COMB.pep:*
- 4: /cgn2_6/ptodata/2/1aa/6B.COMB.pep:*
- 5: /cgn2_6/ptodata/2/1aa/PCIOS.COMB.pep:*
- 6: /cgn2_6/ptodata/2/1aa/Backfill1est1.pep:*

Pred. No. is the number of results predicted by chance to have a score greater than or equal to the score of the result being printed, and is derived by analysis of the total score distribution.

SUMMARIES

Result No.	Score	Query Match	Length	DB ID	Description
1	386	100.0	74	2	US-08-615-232A-6
2	386	100.0	74	3	US-08-470-323-6
3	386	100.0	76	1	US-08-480-449-20
4	386	100.0	76	2	US-08-716-188-3
5	386	100.0	76	2	US-08-660-542-20
6	386	100.0	77	4	US-08-479-603-20
7	386	100.0	77	1	US-08-347-492B-9
8	386	100.0	77	2	US-08-421-144A-6
9	386	100.0	77	2	US-08-798-143-9
10	267	69.2	74	4	US-08-613-822-20
11	255.5	66.2	96	4	US-09-330-637-44
12	249	64.5	76	1	US-07-956-862A-1
13	249	64.5	76	1	US-08-250-958-1
14	249	64.5	76	1	US-08-335-659-1
15	249	64.5	76	2	US-08-716-188-2
16	249	64.5	76	2	US-08-615-232A-5
17	249	64.5	76	3	US-08-470-323-5
18	249	64.5	78	1	US-08-330-163-12
19	249	64.5	78	1	US-08-482-111-12
20	249	64.5	78	5	PCT-US95-00605-1
21	249	64.5	99	1	US-08-127-499A-35
22	249	64.5	99	1	US-08-482-847-35
23	249	64.5	99	1	US-08-347-492B-8
24	249	64.5	99	1	US-08-480-449-19
25	249	64.5	99	2	US-08-479-126B-5
26	249	64.5	99	2	US-08-421-144A-5
27	249	64.5	99	2	US-08-726-830A-5

28	249	64.5	99	2	US-08-660-542-19	Sequence 19, Appl
29	249	64.5	99	2	US-08-798-143-8	Sequence 8, Appl
30	249	64.5	99	3	US-07-927-391-24	Sequence 24, Appl
31	249	64.5	99	3	US-08-995-156A-5	Sequence 5, Appl
32	249	64.5	99	3	US-09-044-856A-5	Sequence 5, Appl
33	249	64.5	99	3	US-09-044-855A-5	Sequence 5, Appl
34	249	64.5	99	4	US-08-679-493A-152	Sequence 152, Appl
35	249	64.5	99	4	US-08-479-603-19	Sequence 19, Appl
36	249	64.5	99	5	PCT-US96-10087-5	Sequence 5, Appl
37	249	64.5	99	6	5212073-2	Sequence 2, Appl
38	241	62.4	104	4	US-08-744-419-2	Sequence 19, Appl
39	234	60.6	76	4	US-08-613-822-19	Sequence 18, Appl
40	234	60.6	99	1	US-08-480-449-18	Sequence 18, Appl
41	234	60.6	99	2	US-08-660-542-18	Sequence 18, Appl
42	234	60.6	99	4	US-08-613-822-18	Sequence 18, Appl
43	234	60.6	99	4	US-08-479-603-18	Sequence 7, Appl
44	234	60.6	109	2	US-08-421-144A-7	Sequence 16, Appl
45	234	60.6	109	3	US-07-927-391-16	

ALIGNMENTS

RESULT 1
US-08-615-232A-6
Sequence 6, Application US/08615232A
Patent No. 5993814
GENERAL INFORMATION:
APPLICANT: WILLIAMS, TIMOTHY J.
APPLICANT: JOSE, PETER J.
APPLICANT: GRIFFITHS-JOHNSON, DAVID A.
APPLICANT: HSUAN, JOHN J.
TITLE OF INVENTION: CHEMOTACTIC CYTOKINE
NUMBER OF SEQUENCES: 11
CORRESPONDENCE ADDRESSES:
ADDRESS: NIXON & VANDERHAYE P.C.
STREET: 1100 NORTH GLEBE ROAD, 8TH FLOOR
CITY: ARLINGTON
STATE: VIRGINIA
COUNTRY: U.S.A.
ZIP: 22201-4714
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
OPERATING SYSTEM: IBM PC compatible
SOFTWARE: Patentin Release #1.0, Version #1.25 (EPO)
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/615, 232A
FILING DATE: 13-AUG-1996
CLASSIFICATION: 424
PRIOR APPLICATION DATA:
APPLICATION NUMBER: GB 9318984
FILING DATE: 14-SEP-1993
APPLICATION NUMBER: GB 9408602
FILING DATE: 29-APR-1994
ATTORNEY/AGENT INFORMATION:
NAME: WILSON, MARY J.
REGISTRATION NUMBER: 32,955
REFERENCE/DOCKET NUMBER: 550-32
TELECOMMUNICATION INFORMATION:
TELEPHONE: (703) 816-4000
TELEFAX: (703) 816-4100
INFORMATION FOR SEQ ID NO: 6:
SEQUENCE CHARACTERISTICS:
LENGTH: 74 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: peptide
US-08-615-232A-6
Query Match 100.0%, Score 386, DB 2, Length 74;

Best Local Similarity 100.0%; Pred. No. 1.3e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPIDRLSESYRTITNIOCPKEAVIFKTRGKGVCAADPKERWVRDSM 60
DB 3 VSIPITCCFNVINRKIPIDRLSESYRTITNIOCPKEAVIFKTRGKGVCAADPKERWVRDSM 62

OY 61 KHLDOIIONLKP 72
DB 63 KHLDOIIONLKP 74

RESULT 2

US-08-470-323-6
Sequence 6, Application US/08470323A
Patent No. 6031080

GENERAL INFORMATION:

APPLICANT: WILLIAMS, TIMOTHY J.
APPLICANT: JOSE, PETER J.
APPLICANT: GRIFFITHS-JOHNSON, DAVID A.

APPLICANT: HSUAN, JOHN J.

TITLE OF INVENTION: CHEMOTACTIC CYTOKINE
FILE REFERENCE: 550-33

CURRENT APPLICATION NUMBER: US/08/470,323A

EARLIER FILING DATE: 1995-06-06

EARLIER APPLICATION NUMBER: PCT/GB94/02006

EARLIER FILING DATE: 1994-09-14

EARLIER APPLICATION NUMBER: GB 9318984.3

EARLIER FILING DATE: 1993-09-14

EARLIER APPLICATION NUMBER: GB 94086902.2

NUMBER OF SEQ ID NOS: 11

SEQ ID NO: 6

LENGTH: 74

TYPE: PRT

ORGANISM: human

US-08-470-323-6

Query Match 100.0%; Score 386; DB 3; Length 74;
Best Local Similarity 100.0%; Pred. No. 1.3e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPIDRLSESYRTITNIOCPKEAVIFKTRGKGVCAADPKERWVRDSM 60
DB 3 VSIPITCCFNVINRKIPIDRLSESYRTITNIOCPKEAVIFKTRGKGVCAADPKERWVRDSM 62

OY 61 KHLDOIIONLKP 72
DB 63 KHLDOIIONLKP 74

RESULT 3

US-08-480-449-20
Sequence 20, Application US/08480449
Patent No. 5686927

GENERAL INFORMATION:

APPLICANT: Godiska, Ronald
APPLICANT: Gray, Patrick W.

TITLE OF INVENTION: MACROPHAGE DERIVED CHEMOKINE
NUMBER OF SEQUENCES: 24

CORRESPONDENCE ADDRESS:

ADDRESSEE: Marshall, O'Toole, Gerstein, Murray & Borun
STREET: 6300 Sears Tower, 233 South Wacker Drive

CITY: Chicago

STATE: Illinois
COUNTRY: United States of America

ZIP: 60606-6402

COMPUTER READABLE FORM:

MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: PatentIn Release #1.0, Version #1.25

CURRENT APPLICATION DATA:

APPLICATION NUMBER: US/08/480,449

FILING DATE:

CLASSIFICATION: 530

ATTORNEY/AGENT INFORMATION:

NAME: Gass, David A.

REGISTRATION NUMBER: 38,153

REFERENCE/DOCKET NUMBER: 27866/32779

TELECOMMUNICATION INFORMATION:

TELEPHONE: 312/474-6300

TELEFAX: 312/474-0448

TELEX: 25-3856

INFORMATION FOR SEQ ID NO: 20:

SEQUENCE CHARACTERISTICS:

LENGTH: 76 amino acids

TYPE: amino acid

STRANDEDNESS: single

TOPOLOGY: linear

MOLECULE TYPE: peptide

FEATURE:

NAME/KEY: misc.feature

OTHER INFORMATION: "Hu MCP-2"

US-08-480-449-20

Query Match 100.0%; Score 386; DB 1; Length 76;
Best Local Similarity 100.0%; Pred. No. 1.3e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPIDRLSESYRTITNIOCPKEAVIFKTRGKGVCAADPKERWVRDSM 60
DB 5 VSIPITCCFNVINRKIPIDRLSESYRTITNIOCPKEAVIFKTRGKGVCAADPKERWVRDSM 64

OY 61 KHLDOIIONLKP 72
DB 65 KHLDOIIONLKP 76

RESULT 4

US-08-716-188-3
Sequence 3, Application US/08716188
Patent No. 5908829

GENERAL INFORMATION:

APPLICANT: KELLY, RODNEY W

TITLE OF INVENTION: USE OF MCP-1 FOR INDUCING RIPENING OF

TITLE OF INVENTION: THE CERVIX

NUMBER OF SEQUENCES: 7

CORRESPONDENCE ADDRESS:

ADDRESSEE: NIXON & VANDERHAYE P.C.

STREET: 1100 NORTH GLEBE ROAD

CITY: ARLINGTON

STATE: VA

COUNTRY: USA

ZIP: 22201

COMPUTER READABLE FORM:

MEDIUM TYPE: Floppy disk

COMPUTER: IBM PC compatible

OPERATING SYSTEM: PC-DOS/MS-DOS

SOFTWARE: PatentIn Release #1.0, Version #1.30

CURRENT APPLICATION DATA:

APPLICATION NUMBER: US/08/716,188

FILING DATE: 30-SEP-1996

CLASSIFICATION: 530

PRIOR APPLICATION DATA:

APPLICATION NUMBER: PCT/GB95/00733

FILING DATE: 31-MAR-1995

PRIOR APPLICATION DATA:

APPLICATION NUMBER: GB 9406463.1

FILING DATE: 31-MAR-1994

ATTORNEY/AGENT INFORMATION:

NAME: SADOFF, B. J.

REGISTRATION NUMBER: 36,663

REFERENCE/DOCKET NUMBER: 117-219

TELECOMMUNICATION INFORMATION:
TELEPHONE: 703-816-4091
TELEFAX: 703-816-4100
INFORMATION FOR SEQ ID NO: 3:
SEQUENCE CHARACTERISTICS:
LENGTH: 76 amino acids
TYPE: amino acid
STRANDEDNESS:
TOPOLOGY: linear
MOLECULE TYPE: peptide
US-08-716-188-3

Query Match 100.0%; Score 386; DB 2; Length 76;
Best Local Similarity 100.0%; Pred. No. 1.3e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPIDRLSEYTRITNIQCPKEAVIFKTRKGKVCADPKERWVRDSM 60
DB 5 VSIPITCCFNVINRKIPIDRLSEYTRITNIQCPKEAVIFKTRKGKVCADPKERWVRDSM 64

OY 61 KHLDFQNLKP 72
DB 65 KHLDFQNLKP 76

RESULT 5
US-08-660-542-20
Sequence 20, Application US/08660542
Patent No. 5932703
GENERAL INFORMATION:
APPLICANT: Godiska, Ronald
APPLICANT: Gray, Patrick W.
TITLE OF INVENTION: MACROPHAGE DERIVED CHEMOKINE AND CHEMOKINE
NUMBER OF SEQUENCES: 32
CORRESPONDENCE ADDRESSES:
ADDRESSEE: Marshall, O'Toole, Gerstein, Murray & Borun
STREET: 6300 Sears Tower, 233 South Wacker Drive
CITY: Chicago
STATE: Illinois
COUNTRY: United States of America
ZIP: 60606-6402
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patentln Release #1.0, Version #1.30
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/660,542
FILING DATE:
CLASSIFICATION: 514
PRIOR APPLICATION DATA:
APPLICATION NUMBER: 08/558,658
FILING DATE: 16-NOV-1995
PRIOR APPLICATION DATA:
APPLICATION NUMBER: 08/479,620
FILING DATE: 07-JUN-1995
ATTORNEY/AGENT INFORMATION:
NAME: Gass, David A.
REGISTRATION NUMBER: 38,153
REFERENCE/DOCKET NUMBER: 27866/33318
TELECOMMUNICATION INFORMATION:
TELEPHONE: 312/474-6300
TELEFAX: 312/474-0448
TELEX: 25-3856
INFORMATION FOR SEQ ID NO: 20:
SEQUENCE CHARACTERISTICS:
LENGTH: 76 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: peptide

FEATURE:
NAME/KEY: misc-feature
OTHER INFORMATION: "Hu MCP-2"
US-08-660-542-20

Query Match 100.0%; Score 386; DB 2; Length 76;
Best Local Similarity 100.0%; Pred. No. 1.3e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPIDRLSEYTRITNIQCPKEAVIFKTRKGKVCADPKERWVRDSM 60
DB 5 VSIPITCCFNVINRKIPIDRLSEYTRITNIQCPKEAVIFKTRKGKVCADPKERWVRDSM 64

OY 61 KHLDFQNLKP 72
DB 65 KHLDFQNLKP 76

RESULT 6
US-08-479-603-20
Sequence 20, Application US/08479603
Patent No. 6320023
GENERAL INFORMATION:
APPLICANT: Godiska, Ronald
APPLICANT: Gray, Patrick W.
TITLE OF INVENTION: MACROPHAGE DERIVED CHEMOKINE
NUMBER OF SEQUENCES: 24
CORRESPONDENCE ADDRESSES:
ADDRESSEE: Marshall, O'Toole, Gerstein, Murray & Borun
STREET: 6300 Sears Tower, 233 South Wacker Drive
CITY: Chicago
STATE: Illinois
COUNTRY: United States of America
ZIP: 60606-6402
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: Patentln Release #1.0, Version #1.25
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/479,603
FILING DATE:
CLASSIFICATION: 530
ATTORNEY/AGENT INFORMATION:
NAME: Gass, David A.
REGISTRATION NUMBER: 38,153
REFERENCE/DOCKET NUMBER: 27866/32780
TELECOMMUNICATION INFORMATION:
TELEPHONE: 312/474-6300
TELEFAX: 312/474-0448
TELEX: 25-3856
INFORMATION FOR SEQ ID NO: 20:
SEQUENCE CHARACTERISTICS:
LENGTH: 76 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: peptide
FEATURE:
NAME/KEY: misc-feature
OTHER INFORMATION: "Hu MCP-2"
US-08-479-603-20

Query Match 100.0%; Score 386; DB 4; Length 76;
Best Local Similarity 100.0%; Pred. No. 1.3e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

OY 1 VSIPITCCFNVINRKIPIDRLSEYTRITNIQCPKEAVIFKTRKGKVCADPKERWVRDSM 60
DB 5 VSIPITCCFNVINRKIPIDRLSEYTRITNIQCPKEAVIFKTRKGKVCADPKERWVRDSM 64

QY 61 KHLDOIFONLKP 72
DB 65 KHLDOIFONLKP 76

RESULT 7

US-08-347-492B-9
Sequence 9, Application US/08347492B
Patent No. 5602008
GENERAL INFORMATION:
APPLICANT: Wilde, Craig G.
APPLICANT: Hawkins, Phillip R.
APPLICANT: Bandman, Olga
APPLICANT: Sellhammer, Jeffrey J.
TITLE OF INVENTION: EXPRESSED CHEMOKINES, THEIR
NUMBER OF INVENTION: PRODUCTION AND USES
NUMBER OF SEQUENCES: 12
CORRESPONDENCE ADDRESS:
ADDRESSEE: Incyte Pharmaceuticals, Inc.
STREET: 3174 Porter Drive
CITY: Palo Alto
STATE: CA
COUNTRY: U.S.
ZIP: 94304
COMPUTER READABLE FORM:
MEDIUM TYPE: Diskette
COMPUTER: IBM Compatible
OPERATING SYSTEM: DOS
SOFTWARE: FASTSEQ Version 1.5
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/347,492B
FILING DATE: 29-NOV-1994
PRIOR APPLICATION DATA:
APPLICATION NUMBER: 08/303,241
FILING DATE: 07-SEP-1994
APPLICATION NUMBER: 08/320,011
FILING DATE: 05-OCT-1994
ATTORNEY/AGENT INFORMATION:
NAME: Luther, Barbara J.
REGISTRATION NUMBER: 33,954
REFERENCE/DOCKET NUMBER: PF-0024
TELECOMMUNICATION INFORMATION:
TELEPHONE: 415-855-0555
TELEFAX: 415-852-0195
INFORMATION FOR SEQ ID NO: 9:
SEQUENCE CHARACTERISTICS:
LENGTH: 77 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: peptide
IMMEDIATE SOURCE:
LIBRARY: GENBANK
CLONE: GI 126829
US-08-347-492B-9

Query Match 100.0%; Score 386; DB 1; Length 77;
Best Local Similarity 100.0%; Pred. No. 1.4e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Caps 0;

QY 1 VSIPITCCFVNNKRIPIQRLSEYTRITNIOCPKEAVIFKTRGKVCADPKRRVWRDSM 60
DB 6 VSIPITCCFVNNKRIPIQRLSEYTRITNIOCPKEAVIFKTRGKVCADPKRRVWRDSM 65
QY 61 KHLDOIFONLKP 72
DB 66 KHLDOIFONLKP 77

RESULT 8
US-08-421-144A-6
Sequence 6, Application US/08421144A

Patent No. 5874211
GENERAL INFORMATION:
APPLICANT: BANDMAN, OLGA
APPLICANT: COLEMAN, ROGER
APPLICANT: STUART, SUSAN G.
TITLE OF INVENTION: NEW CHEMOKINE EXPRESSED IN EOSINOPHILS
NUMBER OF SEQUENCES: 9
CORRESPONDENCE ADDRESS:
ADDRESSEE: INCYTE PHARMACEUTICALS, INC.
STREET: 3174 Porter Drive
CITY: Palo Alto
STATE: CA
COUNTRY: USA
ZIP: 94304
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: PatentIn Release #1.0, Version #1.30
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/421,144A
FILING DATE: 13-APR-1995
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:
NAME: Luther, Barbara J.
REGISTRATION NUMBER: 33954
REFERENCE/DOCKET NUMBER: PF-0031 US
TELECOMMUNICATION INFORMATION:
TELEPHONE: 415-855-0555
TELEFAX: 415-852-0195
INFORMATION FOR SEQ ID NO: 6:
SEQUENCE CHARACTERISTICS:
LENGTH: 77 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: protein
US-08-421-144A-6

Query Match 100.0%; Score 386; DB 2; Length 77;
Best Local Similarity 100.0%; Pred. No. 1.4e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Caps 0;

QY 1 VSIPITCCFVNNKRIPIQRLSEYTRITNIOCPKEAVIFKTRGKVCADPKRRVWRDSM 60
DB 6 VSIPITCCFVNNKRIPIQRLSEYTRITNIOCPKEAVIFKTRGKVCADPKRRVWRDSM 65
QY 61 KHLDOIFONLKP 72
DB 66 KHLDOIFONLKP 77

RESULT 9
US-08-798-143-9
Sequence 9, Application US/08798143
Patent No. 5936068
GENERAL INFORMATION:
APPLICANT: Wilde, Craig G.
APPLICANT: Hawkins, Phillip R.
APPLICANT: Bandman, Olga
APPLICANT: Sellhammer, Jeffrey J.
TITLE OF INVENTION: EXPRESSED CHEMOKINES, THEIR
NUMBER OF SEQUENCES: 12
CORRESPONDENCE ADDRESS:
ADDRESSEE: Incyte Pharmaceuticals, Inc.
STREET: 3174 Porter Drive
CITY: Palo Alto
STATE: CA
COUNTRY: U.S.
ZIP: 94304
COMPUTER READABLE FORM:

MEDIUM TYPE: Diskette
COMPUTER: IBM Compatible
OPERATING SYSTEM: DOS
SOFTWARE: FastSeq Version 1.5
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/798,143
FILING DATE: 10-FEB-1997
CLASSIFICATION: 536
PRIOR APPLICATION DATA:
APPLICATION NUMBER: 08/347,492
FILING DATE: 29-NOV-1994
APPLICATION NUMBER: 08/303,241
FILING DATE: 07-SEP-1994
APPLICATION NUMBER: 08/320,011
FILING DATE: 05-OCT-1994
ATTORNEY/AGENT INFORMATION:
NAME: Luther, Barbara J
REGISTRATION NUMBER: 33,954
REFERENCE/DOCKET NUMBER: PF-0024
TELECOMMUNICATION INFORMATION:
TELEPHONE: 415-855-0555
TELEFAX: 415-852-0195
INFORMATION FOR SEQ ID NO: 9:
SEQUENCE CHARACTERISTICS:
LENGTH: 77 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: peptide
IMMEDIATE SOURCE:
LIBRARY: GENBANK
CLONE: GI 126829
US-08-798-143-9

Query Match 100.0%; Score 386; DB 2; Length 77;
Best Local Similarity 100.0%; Pred. No. 1.4e-43;
Matches 72; Conservative 0; Mismatches 0; Indels 0; Gaps 0;

QY 1 VSPTCCFNVNRRKIPQRLSEYRITNIOCPKRAVIFKTRKRGKVCADPKRWVDSM 60
DB 6 VSPTCCFNVNRRKIPQRLSEYRITNIOCPKRAVIFKTRKRGKVCADPKRWVDSM 65

QY 61 KHLDFQNLKP 72
DB 66 KHLDFQNLKP 77

RESULT 10
US-08-613-822-20
Sequence 20, Application US/08613822
Patent No. 6174995
GENERAL INFORMATION:
APPLICANT: Li, Haodong
TITLE OF INVENTION: Human Chemokine Polypeptides
NUMBER OF SEQUENCES: 20
CORRESPONDENCE ADDRESS:
ADDRESSEE: Human Genome Sciences, Inc.
STREET: 9410 Key West Avenue
CITY: Rockville
STATE: MD
COUNTRY: USA
ZIP: 20850
COMPUTER READABLE FORM:
MEDIUM TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: PatentIn Release #1.0, Version #1.30
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/613,822
FILING DATE: 23-FEB-1996
CLASSIFICATION: 435
ATTORNEY/AGENT INFORMATION:

NAME: Millstein, Larry S
REGISTRATION NUMBER: 34,679
TELECOMMUNICATION INFORMATION:
TELEPHONE: 301-309-8504
TELEFAX: 301-309-8512
INFORMATION FOR SEQ ID NO: 20:
SEQUENCE CHARACTERISTICS:
LENGTH: 74 amino acids
TYPE: amino acid
STRANDEDNESS: single
TOPOLOGY: linear
MOLECULE TYPE: protein
US-08-613-822-20

Query Match 69.2%; Score 267; DB 4; Length 74;
Best Local Similarity 66.2%; Pred. No. 5.4e-28;
Matches 47; Conservative 13; Mismatches 11; Indels 0; Gaps 0;

QY 2 SIPITCCFNVNRRKIPQRLSEYRITNIOCPKRAVIFKTRKRGKVCADPKRWVDSM 61
DB 4 SVPTCCFNVNRRKIPQRLSEYRITNIOCPKRAVIFKTRKRGKVCADPKRWVDSM 63

QY 62 HLDQIFQNLKP 72
DB 64 YLDQKSPTRKP 74

RESULT 11
US-09-230-637-44
Sequence 44, Application US/09230637
Patent No. 6264958
GENERAL INFORMATION:
APPLICANT: Hayward, Gary
APPLICANT: Nicholas, John
APPLICANT: Hardwick, J. Marie
TITLE OF INVENTION: No. 6264958el Genes of Kaposi's Sarcoma
FILE REFERENCE: 1107,78372
CURRENT APPLICATION NUMBER: US/09/230,637
CURRENT FILING DATE: 1999-11-23
PRIOR APPLICATION NUMBER: 60/022,591
PRIOR FILING DATE: 1996-07-25
PRIOR APPLICATION NUMBER: PCT US 97/12931
PRIOR FILING DATE: 1997-07-24
NUMBER OF SEQ ID NOS: 62
SOFTWARE: FastSeq for Windows Version 4.0
SEQ ID NO 44
LENGTH: 96
TYPE: PRT
ORGANISM: Homo sapiens
US-09-230-637-44

Query Match 66.2%; Score 255.5; DB 4; Length 96;
Best Local Similarity 66.2%; Pred. No. 2.4e-26;
Matches 47; Conservative 12; Mismatches 11; Indels 1; Gaps 1;

QY 2 SIPITCCFNVNRRKIPQRLSEYRITNIOCPKRAVIFKTRKRGKVCADPKRWVDSM 61
DB 27 SVPTCCFNVNRRKIPQRLSEYRITNIOCPKRAVIFKTRKRGKVCADPKRWVDSM 85

QY 62 HLDQIFQNLKP 72
DB 86 YLDQKSPTRKP 96

RESULT 12
US-07-956-862A-1
Sequence 1, Application US/07956862A
Patent No. 5413778
GENERAL INFORMATION:

```

MEDIAN TYPE: Floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: PatentIn Release #1.0, Version #1.30
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/250,958
FILING DATE: 27-MAY-1994
CLASSIFICATION: 514
PRIOR APPLICATION DATA:
APPLICATION NUMBER: 07/965,678
FILING DATE: 22-OCT-1992
ATTORNEY/AGENT INFORMATION:
NAME: WALKER, Baird & W
REGISTRATION NUMBER: 35,400
REFERENCE/DOCKET NUMBER: 2077-206A
TELECOMMUNICATION INFORMATION:
TELEPHONE: (202)783-6040
TELEFAX: (202)783-6031
INFORMATION FOR SEQ ID NO: 1:
SEQUENCE CHARACTERISTICS:
LENGTH: 76 amino acids
type: amino acid
STRANDEDNESS:
TOPOLOGY: linear
MOLECULE TYPE: peptide
HYPOTHETICAL: NO
FRAGMENT TYPE: N-terminal
US-08-250-958-1

```

[illegible]

PRIOR APPLICATION DATA:
APPLICATION NUMBER: 07/956,863
FILING DATE: 05-OCT-1992
ATTORNEY/AGENT INFORMATION:
NAME: WALKER, Barbara W.
REGISTRATION NUMBER: 35,400
REFERENCE/DOCKET NUMBER: 2077-205A
TELECOMMUNICATION INFORMATION:
TELEPHONE: (202)783-6040
TELEFAX: (202)783-6031
INFORMATION FOR SEQ ID NO: 1:
SEQUENCE CHARACTERISTICS:
LENGTH: 76 amino acids
TYPE: amino acid
STRANDEDNESS: not relevant
TOPOLOGY: linear
MOLECULE TYPE: peptide
FRAGMENT TYPE: N-terminal
US-08-235-659-1

Match 64.5%; Score 249; DB 1; Length 76;
Best Local Similarity: 62.0%; Pred. No. 1,3e-25;
Matches 44; Conservative 12; Mismatches 15; Indels 0; Gaps 0;
QY 1 VSIPITCCFENVIRKIPIDRLESYTRITNIOCPKEAVIFKTKRGKEVCADPKERWVDSM 60
DB 5 INAPVTCGYNFTNRKISVQRLASTYRITSSCKPEAVIFKTIYAKETICADPKQKWVDSM 64
QY 61 KHLDOIPONLK 71
DB 65 DHLDKOTOTPK 75

RESULT 15
US-08-716-188-2
Sequence 2, Application us/08716188
Patent No. 5908829
GENERAL INFORMATION:
APPLICANT: KELLY, RODNEY W
TITLE OF INVENTION: USE OF MCP-1 FOR INDUCING RIPENING OF
NUMBER OF SEQUENCES: 7
CORRESPONDENCE ADDRESS:
ADDRESSEE: NIXON & VANDERHAYE P.C.
STREET: 1100 NORTH GLEBE ROAD
CITY: ARLINGTON
STATE: VA
COUNTRY: USA
ZIP: 22201
COMPUTER READABLE FORM:
MEDIUM TYPE: floppy disk
COMPUTER: IBM PC compatible
OPERATING SYSTEM: PC-DOS/MS-DOS
SOFTWARE: PatentIn Release #1.0, Version #1.30
CURRENT APPLICATION DATA:
APPLICATION NUMBER: US/08/716,188
FILING DATE: 30-SEP-1996
CLASSIFICATION: 530
PRIOR APPLICATION DATA:
APPLICATION NUMBER: PCT/GB95/00733
FILING DATE: 31-MAR-1995
PRIOR APPLICATION DATA:
APPLICATION NUMBER: GB 9406463.1
FILING DATE: 31-MAR-1994
ATTORNEY/AGENT INFORMATION:
NAME: SADOFF, B. J.
REGISTRATION NUMBER: 36,663
REFERENCE/DOCKET NUMBER: 117-219
TELECOMMUNICATION INFORMATION:
TELEPHONE: 703-816-4091
TELEFAX: 703-816-4100
INFORMATION FOR SEQ ID NO: 2:

SEQUENCE CHARACTERISTICS:
LENGTH: 76 amino acids
TYPE: amino acid
STRANDEDNESS:
TOPOLOGY: linear
MOLECULE TYPE: peptide
US-08-716-188-2

Query Match 64.5%; Score 249; DB 2; Length 76;
Best Local Similarity: 62.0%; Pred. No. 1,3e-25;
Matches 44; Conservative 12; Mismatches 15; Indels 0; Gaps 0;
QY 1 VSIPITCCFENVIRKIPIDRLESYTRITNIOCPKEAVIFKTKRGKEVCADPKERWVDSM 60
DB 5 INAPVTCGYNFTNRKISVQRLASTYRITSSCKPEAVIFKTIYAKETICADPKQKWVDSM 64
QY 61 KHLDOIPONLK 71
DB 65 DHLDKOTOTPK 75

Search completed: August 12, 2002, 10:47:21
Job time: 22 sec

